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ECONOMIC DEVELOPMENT & MULTILATERAL TRADE COOPERATION

Editors

Simon J. Evenett • Bernard M. Hoekman

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*Edited by Simon J. Evenett
and Bernard M. Hoekman*

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ABBREVIATIONS

ABST	Agreement on Access to Basic Science and Technology
ADB	Asian Development Bank
AFBF	American Farm Bureau Federation
AGOA	African Growth and Opportunity Act
APEC	Asia-Pacific Economic Cooperation
ASCM	Agreement on Subsidies and Countervailing Measures
ASYCUDA	Automated System for Customs Data
ATPA	Andean Trade Preferences Act
CAFTA	Central America Free Trade Agreement
CAP	Common Agricultural Policy
CBI	Caribbean Basin Initiative
CBTPA	Caribbean Basin Free Trade Partnership Act
CCT	Common Customs Tariff
CGE	computable general equilibrium
CSE	consumer support estimate
CVD	countervailing duty
DSU	Dispute Settlement Understanding
DTIS	Diagnostic Trade Integration Study
EBA	Everything But Arms
EBRD	European Bank for Reconstruction and Development
EC	European Communities
EDF	European Development Fund
EPZ	export processing zone
EU	European Union
FAIR	Federal Agriculture Improvement and Reform Act

FAO	Food and Agriculture Organization
FDI	foreign direct investment
FSRIA	Farm Security and Rural Investment Act
FTAA	Free Trade Area of the Americas
FYR	former Yugoslav Republic of
GATS	General Agreement on Trade in Services
GATT	General Agreement on Tariffs and Trade
GDP	gross domestic product
GEF	Global Environment Facility
GNI	gross national income
GPA	Agreement on Government Procurement
GSP	generalized system of preferences
HS	Harmonized Commodity Description and Coding System
ICAO	International Civil Aviation Organization
ICC	International Chamber of Commerce
ICN	International Competition Network
IDB	Inter-American Development Bank
IFF	International Finance Facility
IFSC	Integrated Framework Steering Committee
IFWG	Integrated Framework Working Group
IMF	International Monetary Fund
IMO	International Maritime Organization
IRTM	investment-related trade measure
ITA	International Technology Agreement
ITC	International Trade Centre
LDC	least developed country
MFA	Multifiber Arrangement
MFN	most favored nation
NAFTA	North American Free Trade Agreement
NAMA	Non-Agricultural Market Access
NGO	nongovernmental organization
ODA	official development assistance
OECD	Organisation for Economic Co-operation and Development
PAC	political action committee
PRSP	Poverty Reduction Strategy Paper
PSE	producer support estimate
R&D	research and development
SCM	subsidies and countervailing measures
SDR	special drawing right
SDT	special and differential treatment

SfD	Special Fund for Diversification
TIM	Trade Integration Mechanism
TRAINS	Trade Analysis and Information System
TRIM	trade-related investment measure
TRIPS	Trade-Related Aspects of Intellectual Property Rights
UNCEFACT	United Nations Centre for Trade Facilitation and Electronic Business
UNCTAD	United Nations Conference on Trade and Development
UNDP	United Nations Development Programme
UNECE	United Nations Economic Commission for Europe
URAA	Uruguay Agreement on Agriculture
URGPA	Uruguay Round Agreement on Government Procurement
VAT	value-added tax
WCO	World Customs Organization
WIPO	World Intellectual Property Organization
WTO	World Trade Organization

INTRODUCTION AND OVERVIEW

Simon J. Evenett and Bernard M. Hoekman

What can trade agreements do to promote development? How could rules be designed to benefit poor countries? Should such rules be adopted? Can multilateral trade cooperation in the World Trade Organization (WTO) help developing countries create and strengthen institutions and regulatory regimes that will enhance the gains from trade and integration into the global economy? These are questions that confront policy makers and citizens in both rich and poor countries. They are the subject of the contributions to this volume, a collection of studies that analyze how the trading system could be made more supportive of economic development without eroding the core function of the WTO: the internalization of cross-border policy-induced spillovers. While many of the chapters deal explicitly with subjects that are on the agenda of the Doha Round of negotiations, the focus of this book is broader and the questions addressed more fundamental. They revolve around the design of agreements and negotiating modalities; the need for, and feasibility of, differential application of multilateral norms; international policy coherence; possible linkages between development assistance and trade policy commitments; and alternative approaches to enforcing negotiated commitments. In addressing these questions, the contributors summarize and analyze the status quo in a given area and propose approaches that in their view would promote economic development prospects.

Enhancing the “development relevance” of the trading system became a formal objective of WTO members with the launch of the Doha Development Agenda at the WTO’s Ministerial Conference in November 2001 in Doha, Qatar. Whether the WTO is an organization that can and should be used to pursue development objectives is not uncontroversial. Some are of the view that the WTO’s focus should be limited to increasing market access opportunities and negotiating away

policies that impose negative spillovers on other countries and that the best way to address differentiated capacity is to allow the poorest countries to step aside from the process.¹ Global liberalization, they argue, can promote development prospects, although the link is often indirect, with much depending on whether governments pursue complementary policies to enhance the ability of entrepreneurs and poor households to benefit from better market access opportunities. According to this view, promoting the adoption of such policies is the task of national governments and their citizens, supported by international development agencies, and is not the task of the WTO.

Others argue that the choice was made in Doha to promote development through the WTO and that members must therefore go beyond these traditional focal points and identify actions (international cooperation, information exchange, specific agreements, and so forth) that will help reduce poverty more directly. From this perspective, relying on self-interested, reciprocal bargaining of the type that characterizes multilateral trade negotiations is not sufficient; additional efforts are needed to ensure that the disciplines of the WTO help reduce poverty around the world. The challenge for those taking this view is to identify how this might be done so that the baby—a trading system based on enforceable rules that increases the predictability of policies and thus reduces uncertainty—is not thrown out with the bathwater.² Meeting this challenge is a difficult task.

This crude characterization of two very different views of the appropriate role of the WTO is helpful in understanding the debates between, and the positions taken by, governments and civil society representatives on the appropriate work program for the WTO in the late 1990s and the difficulty in making negotiating progress in the Doha Round. Development has become a higher profile subject in the WTO, for a number of reasons. Developing countries have historically played only a minor role in the multilateral trading system. Until the Uruguay Round (negotiated between 1986 and 1993), their participation was effectively voluntary, and many developing countries agreed to only a limited number of binding commitments. This changed with the entry into force of the WTO in 1995 as a result of the so-called Single Undertaking, in which all contracting parties to the General Agreement on Tariffs and Trade (GATT) were required to accept almost all of the various proposals and negotiated agreements as one package in order to join the WTO. Some of the agreements negotiated in the Uruguay Round, in particular the Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS), were highly skewed toward benefiting rich countries (Finger 2002). Other previously negotiated GATT agreements that developing countries had not signed but that became applicable as a result of the Single Undertaking generated asymmetric implementation costs. The impact of these agreements was almost exclusively on developing countries, as the rules reflected existing practices of the industrial

members of the Organisation for Economic Co-operation and Development (OECD) (Finger and Schuler 2000). While developing country negotiators presumably perceived there to be offsetting benefits associated with the entire Uruguay Round package—which included the agreements to remove the Multi-fiber Arrangement quotas on textile exports, to ban voluntary export restraints, to reintegrate agriculture into the GATT, and to strengthen dispute settlement provisions—it is fair to say that serious doubts and regret emerged in many low-income countries in the first years of the WTO's operation.

Having been very successful at reducing trade barriers among OECD countries, the multilateral trading system is now entering difficult terrain as developing countries become more active participants, particularly given the growing differences among developing countries. Moreover, the focus of deliberations at the WTO has shifted toward nontariff measures and domestic regulation. This is the case for both the GATT and the General Agreement on Trade in Services (GATS), under which, because of the intangible nature of services, tariffs are typically not the instrument used to protect domestic firms. In the case of both goods and services, often it is not obvious what type of international cooperation makes sense for regulatory policies. Clearly, some types of national policy, and international rules on those policies, are important from a development perspective—after all, research has shown that a good investment climate and good public sector governance are key ingredients for sustained economic growth (World Bank 2005). Insofar as the WTO is (or could be) an institution that is used to define good practice and act as a focal point for governments seeking to implement such policies, this is one means by which it could make an important contribution to development. In this respect it is worth noting that policy areas such as competition law, investment policy, transparency in government procurement, and trade facilitation, which were proposed as subjects for negotiation at the WTO, are all determinants of the investment climate prevailing in a country. Such policies can also impose negative spillovers on other countries, giving rise to the traditional rationale for international cooperation.

How WTO members address regulatory choices that create cross-border spillovers and to what extent the focus should go beyond addressing spillovers to center on “good practices” are, therefore, two of the major questions confronting trade diplomats, national officials, civil society, and analysts. Here an important factor is the WTO dispute settlement mechanism, which has become a key driver motivating efforts by some interest groups to advocate putting new issues on the WTO negotiating table. The fact that the WTO has a system of compulsory, third-party adjudication is a major strength in terms of ensuring that commitments can be enforced and have value, but it is also a factor that may make governments (and other stakeholders) less inclined to consider engaging in binding agreements when the expected net benefits of cooperation are particularly unclear. In defining

the appropriate reach of the WTO, the type of enforcement mechanism that should apply is an important consideration.

While much attention is being devoted to the role of the WTO in realizing international cooperation on “behind-the-border” policies, there remains as well a large, more “traditional” market access agenda. Realizing the promise of trade reforms through reciprocal bargaining requires a “negotiating set” that has something for everyone. While traditional market access matters remain very significant, especially in sectors such as agriculture, on average tariff barriers are now quite low in many industrial countries. This suggests one hypothesis as to why countries have been seeking to expand the negotiating set: by proposing new rules for behind-the-border policies, it becomes possible in principle to link these to reforms in sensitive market access areas, such as agriculture. Such a linkage strategy can be effective, but it can also be highly divisive, especially if a large fraction of the membership is concerned that any proposals for new multilateral rules might not be in its interest, perhaps because they perceive their negotiating strategy solely in market access terms.³

The traditional dynamics of reciprocity in the WTO negotiating process require that developing countries offer enough to induce other countries to take on the domestic interest groups that benefit from trade protection and vice versa. If there is little desire to engage on new issues (that is, to pursue a broader linkage strategy), by necessity the focus must remain limited to trading concessions on trade policies for goods and services. This has implications for the traditional developing country strategy in the GATT of seeking less than full reciprocity and insisting on preferential access to OECD markets. For faster progress to be made than what major players are willing to undertake unilaterally, developing countries—especially those with larger markets and higher income levels—will have to reconsider this traditional approach. For these countries there is still much scope to trade market access commitments in both goods and services, as average barriers remain high and many have not bound their tariffs at currently applied levels. Moreover, from an economic (but not a political) perspective, in contrast to regulatory issues or demands for the stronger enforcement of rights to intangible assets, both of which *may* entail a zero-sum bargain, the market access agenda implies trading “bads,” so that there is a greater likelihood that all, including least developed countries (LDCs), gain at the end of the day. Given that they have much better access to major markets than many other developing countries, the greatest potential market access gains for LDCs are in other developing country markets.

1.1 Overview of the Chapters

The contributions in this volume are organized into four parts: the political economy of market access and the design of negotiating modalities, assessments of past and current approaches to addressing development concerns within the

multilateral trade regime, the design of rules and their enforcement, and the use of issue linkages in negotiations.⁴ For a WTO trade agreement to be beneficial from a development (growth) perspective, arguably it should accomplish at least one of the three following outcomes: remove foreign barriers to trade in products that poor countries produce and eliminate policies that negatively affect those countries' terms of trade; lower domestic barriers so as to reduce the prices of goods and services firms and households consume; and encourage the adoption of trade-related and complementary regulations and institutions that support development.

The chapters in this volume focus on the factors influencing the likelihood of attaining these three beneficial outcomes and their possible magnitudes. Realization of the first outcome is constrained by political economy forces. Small, poor countries have little to offer in the mercantilist WTO exchange of concessions to induce large countries to remove policies that harm them. This helps explain why OECD barriers to trade in products in which developing countries have a comparative advantage remain higher than on other products. An implication—stressed in part I of this volume—is that greater efforts are required to mobilize reciprocal liberalization by developing countries (see chapter 3 on negotiating modalities for merchandise trade) as well as domestic forces in OECD countries to oppose the continued use of protectionist policies in the sectors concerned (see chapters 1 and 2 on agriculture, a key sector for developing countries, and chapter 4 on services). Thus the focus of these chapters is on the political economy of trade reform—the determinants of prevailing domestic policies that support remaining protection and the incidence of these policies within the OECD countries that implement them.

Part II focuses on development and the trading system. These chapters analyze past approaches toward special and differential treatment, including preferential access programs; the need to design more balanced rules; and the importance of linking the trade policy reform agenda to the programs and activities of donors and development institutions. All of the chapters in part II are relevant to achieving the second and third beneficial outcome listed above.

Realization of the third outcome (encouraging the adoption of better regulation and institutions) may be impeded by the fact that the multilateral disciplines in regulatory areas have tended to be based on the experiences of high-income countries—WTO rules on intellectual property protection are a good example. The principal development challenge here is to design rules that will help improve the investment climate in poor countries and the ability of firms based in those economies to engage in international commerce. The associated trade negotiating challenge is how to do this through *quid pro quo* bargaining. From a development perspective, an important role of the system should be to identify good policies and design multilateral agreements accordingly. This is the focus of the chapters in part III.

When all is said and done, each party to a negotiation has to perceive that a proposed deal is in its interest. To the extent that industrial countries give development objectives a larger weight, this should enter into this assessment. While this makes negotiations more complex, in practice any good deal will inevitably involve trade-offs across measures. The last two chapters of the volume turn to the design of such package deals, examining the extent to which issue linkages are needed and how policy makers can assess whether they are feasible and desirable.

What follows is a summary of the findings of the chapters from the broader perspective of economic development and the world trading system.

1.1.1 Part I: Political Economy of Market Access

The volume's findings on market access–related matters are summarized below.

Market access for agricultural goods. Making further progress to reduce trade-distorting policies in agriculture is perceived to be central to the development prospects of many countries and, increasingly, for the credibility and relevance of the world trading system. The majority of the population in East Asia, South Asia, and Sub-Saharan Africa lives in rural areas and is thus dependent, directly or indirectly, on agriculture. The fact that barriers to trade in agriculture are much higher than protection in general is a major source of discrimination against developing country farmers and those dependent on rural economies.⁵

Despite the fact that the inclusion of agricultural policy disciplines in the Uruguay Round was justifiably hailed as a major achievement, the commitments that were made—a ban on the use of quantitative restrictions, the resulting tariffication of border protection in this sector, minimum market access commitments for the most protected commodities, commitments to bind and reduce export subsidies, and the adoption of an aggregate measure of support—were not meant to significantly lower agricultural protection in the near term. The effective level of protection has diminished little since the creation of the WTO, although the extent to which trade-distorting instruments—output-based subsidies and market price support—are used has declined, from 83 to 66 percent of the total income support to farmers (Tangermann 2005).

As Patrick Messerlin discusses in chapter 1, total net transfers from consumers and taxpayers to farmers in OECD countries represented 37 percent of total farm revenue in 1986–88. By 2003, after the implementation of all Uruguay Round commitments on agriculture, this percentage had fallen a little, to 32 percent of farm revenue.⁶ The nominal producer protection coefficient (the ratio of prices

received by producers to the border price) in the OECD also fell from 0.58 in 1986–88 to 0.31 in 2003, and the number of active farmers declined. As a result, support per farmer rose 31 percent in the United States and 60 percent in the European Union (EU) countries. Messerlin documents that the majority of this support accrues to larger and richer farmers and to landowners. Smaller and poorer farm-dependent households gain relatively little.

The impact of distorting agricultural support policies in many OECD countries is not limited to larger middle-income countries, such as Argentina or Brazil. These policies also have a major detrimental effect on many LDCs. On average, 18 percent of the total value of LDC exports—but just 3–4 percent of exports by other countries are in goods that are subsidized by at least one WTO member (Hoekman, Ng, and Olarreaga 2004). A similar observation holds for imports: 9 percent of LDC imports but just 3–4 percent of imports by other countries involve products that are subsidized.

Numerous analyses have documented the detrimental effects of OECD policies on developing countries. The sugar market, for example, is severely distorted by policies, with OECD protection rates frequently exceeding 200 percent (Mitchell 2003). Producers in those countries receive more than twice the world market price. In 2003 total OECD country support to sugar producers amounted to approximately \$6.4 billion, a sum equal to the total value of developing country sugar exports at that time. U.S. subsidies to cotton growers totaled \$3.9 billion in 2003, three times U.S. foreign aid to Africa. These subsidies depressed world cotton prices by about 10 percent, cutting the income of poor farmers in West Africa and in Central and South Asia. In West Africa alone, where cotton is a critical cash crop for many small-scale and near-subsistence farmers, annual income losses for cotton growers are estimated at about \$250 million a year (Baffes 2003).

A major feature of these policies is that some developing countries are affected quite differently from others. Some producers benefit from preferential access for certain products at the expense of other developing countries (for example, Mauritius versus Brazil on sugar), and some consumers in importing developing countries benefit from artificially low prices of some commodities. But overall, studies have shown that the distortions created by OECD agricultural policies have negative repercussions on developing countries and are a major source of discriminatory bias in the world trading system today.

Agriculture accounts for only a small share of total economic activity (as measured by output or by employment) in OECD countries—helping to explain the prevalence of trade-distorting policies. The small size implies that the overall relative cost of these policies, even though large in absolute terms, is small. The marginal cost per consumer or taxpayer is not large enough to mobilize large-scale opposition to farm support policies. One way to increase the pressure for

reform is, then, to mobilize groups that are concerned with the impact of agricultural policies on important nonconsumption-related issues—development is one, the environment another. Understanding the effectiveness of such counter-groups in domestic political forums is therefore of interest.

In chapter 2 Kishore Gawande analyzes the political economy of agricultural trade policy in the United States. The incidence and distribution of farm policies described by Messerlin are the outcome of a political process. Understanding that process is important in its own right and particularly so in instances where the scope for international reciprocal bargaining is limited, as is true as far as most developing countries are concerned. Gawande surveys the empirical literature on the political economy of agricultural protection. He uses a new, detailed data set of contributions by agricultural political action committees (PACs) in the United States over five congressional election cycles (1991–2000) to investigate the relationship between lobbying spending and agricultural protection. A detailed analysis of campaign contributions by agricultural PACs indicates that in most sectors the majority of contributions are made by a very small number of PACs.

While many empirical studies have confirmed the role played by lobbies in influencing farm policy, especially in the United States, few have examined the structure of lobbying at a level of detail sufficient to reveal patterns about who lobbies, who is lobbied, and whether lobbies accomplish their goal of influencing policy. Gawande's econometric estimates lead to three conclusions. First, lobbying spending by agricultural PACs is positively associated with the use of nontariff barriers and specific tariffs by the United States. Second, there is also a strong association between the average U.S. tariff on goods that benefit from U.S. export subsidies and lobbying spending. Third, there is no association between agricultural protection and trade measures, such as import penetration and the export to output ratio, often used by analysts to "predict" policy preferences (that is, to identify "sensitive sectors"). Gawande's findings reveal that these trade measures can be misleading—what matters are direct measures of pressure, such as lobbying spending. Unfortunately, such data are publicly available only in the United States, suggesting that more effort is needed to compile such information and make it publicly available. In principle, this could be a task taken up by the WTO's Trade Policy Review Body, although that would imply a major change in direction in terms of what that body monitors.

Market access for nonagricultural goods. Another continuing source of discrimination against developing countries is the complex system of high tariffs, quotas, and export restraints on textiles and clothing, as well as tariff peaks in other, mostly labor-intensive manufactured goods. The 1995 WTO Agreement on Textiles and Clothing required the abolition of all quantitative restrictions on textile

trade by January 1, 2005. Tariff barriers to trade in this sector remain high, however, and competitive exporters confront the threat of contingent protection—safeguards and, especially, antidumping. Antidumping has become a frequently used instrument in both industrial and developing countries.

The challenge confronting negotiators on nonagricultural market access is to lower both remaining tariff peaks and overall average levels of protection. As average tariff rates in most industrial countries are now relatively low, the main focus from a development (and an economic efficiency) perspective should be to reduce the dispersion in tariff protection by reducing the highest tariffs substantially more than the average. The most straightforward way of doing this is to apply a nonlinear tariff reduction formula to each country's prevailing tariffs. At the time of writing, this is the approach being pursued in the Doha Round. In chapter 3 Francois, Martin, and Manole argue that there are important advantages to developing countries in formula approaches to tariff negotiations.⁷ They survey a range of options that lie between the sharply "top-down" Swiss formula—a nonlinear formula that reduces higher tariffs by proportionately more than low tariffs—and a constant percentage (or linear) cut in tariffs. Over the range of options considered, these three authors find that the economic impact for an importing country is not greatly influenced by the extent to which higher tariffs are targeted for larger cuts. They also find that top-down approaches are more effective in reducing tariff escalation and therefore provide greater market access gains to poor countries.

What matters for developing countries in this connection is not just the impact of alternative formulas on tariffs imposed by trading partners—industrial and developing—on their main exports but also on their own tariffs. The focus of WTO negotiations is not on applied tariffs but on the levels at which tariff lines are "bound" by countries. In the case of developing countries, much of their tariff structures remain unbound. One concession that developing countries could make in the Doha Round is to bind all tariffs. This is likely to be in their own interest, as binding reduces policy uncertainty and thus has a positive impact on the risk premiums demanded by investors (Francois and Martin 2004). Binding is also the negotiating coin of the WTO.

One subject not addressed in this volume is contingent protection. Whatever the outcome of negotiations on nonagricultural market access, antidumping in particular has become very prevalent as a means of reimposing restrictions on imports.⁸ In terms of the simple ratio of number of actions taken to total imports, developing countries are now the most intensive users of antidumping—on this metric, then, this is no longer a North-South issue. In the majority of cases, developing countries target other developing countries' exports (Finger, Ng, and Wangchuk 2002). The existence of antidumping creates substantial uncertainty regarding the conditions of market access facing exporters. Investigations have a

chilling effect on imports (they signal importers to diversify away from targeted suppliers). This has been of longstanding concern to East Asian countries, in particular. China now confronts the highest incidence of investigations and the highest average level of duties in many countries. Bown, Hoekman, and Özden (2003) note that the number of cases against developing countries in the United States is much higher than their share in U.S. imports. The average duty on industrial countries (excluding Japan) was 31 percent, compared with 53 percent for developing countries. Similar patterns hold for other major users of antidumping. China is the most often targeted country by EU antidumping, accounting for some 20 percent of all investigations in recent years, with average duties of 40 percent and in some cases more than 100 percent (Liu and Van den Bussche 2003). But the most striking empirical regularity here is the rapid expansion in the number of developing countries that are using antidumping, mostly against other developing countries.

Market access for services. Modern economies are services economies. More than 70 percent of national income in OECD countries is created in service industries, and the share of total employment accounted for by services is even higher. One of the stylized facts of economic development is that the share of services in gross domestic product and employment rises as per capita incomes increase. This is driven by increasing specialization, the exchange of services through the market, and the fact that the scope for improvements in (labor) productivity in the production of services is often less than in agriculture and manufacturing, so that over time the real costs of services rise relative to merchandise, as does the share of total employment in services (Baumol 1967). The tradability of services has been increasing dramatically since the mid-1980s, driven by a mix of policy and technological changes that have lowered the cost of producing and trading services. To a large extent, the process of globalization reflects developments in service industries, in particular transport and telecommunications.

One policy implication of the rise of services is that the competitiveness of most firms increasingly depends on the availability of low-cost and high-quality producer services in their markets. Efficient service industries are thus of great importance to both developing and industrial economies. For some countries in which the biggest export industry is tourism, a good transportation and communications infrastructure is a key determinant of growth. Ensuring access to modern services technologies is often a prerequisite for firms to capitalize on the comparative advantage of an economy.

Many governments around the world have been pursuing structural reforms, which typically include the introduction of greater competition in service markets. Depending on local circumstances and political factors, governments may face more or less opposition to such reforms. Although often supported by the

manufacturing sector, which has an interest in having access to a wide array of efficiently produced service inputs, final consumers may oppose liberalization because of concerns about a reduction in the frequency or geographical coverage of services (in particular telecommunications and transport) and possible increases in prices if subsidies are eliminated. Labor unions may be concerned about the potential for large-scale layoffs. Thus the opposition of politically powerful vested interests may constrain governments from implementing reforms that would benefit society at large. If this is the case, the WTO offers a potential way to break domestic deadlocks by mobilizing groups to support reform. This reasoning is analogous to that which applies in the goods context. The same analogy holds with respect to export interests. While many services remain less tradable than goods, export interests in services do exist, including the so-called fourth mode of the GATS (the temporary movement of service providers). Given that foreign direct investment (FDI) is a significant mode for supplying nontradable services, potential investors may also have a strong “export” interest and supply the traditional political economy dynamics that have driven GATT talks. In addition to supporting the political economy of reform, the WTO may be helpful in providing useful templates for pro-competitive regulatory regimes. Finally, a potentially important and beneficial role that the WTO process can play is to enhance the credibility of a government’s economic policy stance regarding services. The GATS offers a mechanism for governments to precommit to a reform path, by spelling out what will be done over a period of time and locking in reforms that have already been achieved.

To date relatively little has been achieved in moving beyond the prevailing national status quo on services in most WTO members (Marchetti 2004). In chapter 4 Felix Eschenbach explores the extent to which transition economies have used the GATS to lock in and commit themselves to further services reform. He examines the degree of openness to which 16 transition economies have committed themselves in the GATS and compares this with an index of applied policies (and policy reform). Eschenbach finds that the rank ordering of countries on the basis of actual openness (the degree of reforms actually implemented) is not the same as the ranking on the basis of GATS commitments. This disparity may stem from the fact that countries may perceive there to be little value to making commitments from a domestic reform perspective (none of these countries is large enough to be able to negotiate much in the way of effective additional access to foreign markets), they may rely on other external commitment mechanisms, or they may use the GATS as a pure signaling device, without a credible commitment to reform. His findings illustrate not only that services are an area in which much remains to be achieved to expand national commitments but also that doing so will not be straightforward.

I.1.2 Part II: Development and the Trade Regime

The case for exempting developing countries from liberalization is not compelling, as trade protection hurts poor people and distorts resource allocation by raising the prices of goods. But low-income countries with weak institutional capacity may not be able to benefit fully from implementing specific WTO agreements, especially if doing so requires significant investments of scarce resources. In world trade negotiations there is a constant tension between attempting to establish a set of universally applicable rules and allowing certain opt-outs or exceptions, particularly for countries in which resources are at the greatest premium. Special and differential treatment (SDT) is an attempt to manage this tension. It spans promises by high-income countries to provide preferential access to their markets, the right for developing countries to limit reciprocity in trade negotiating rounds to levels consistent with development needs, and greater freedom for them to use trade policies. The premise underlying SDT is that industries in developing countries need assistance for some time in both their home market (protection) and in export markets (preferences).

In chapter 5 Alexander Keck and Patrick Low review the history of SDT in the GATT and the WTO, discussing both preferential access to OECD markets and issues relating to rule making and rule enforcement. Given the very large differences in the capacities and policy priorities of WTO members, SDT for developing countries continues to be a defining feature of the multilateral trading system. Keck and Low describe the key aspects of what has become an increasingly entangled and multifaceted discussion. Their chapter includes an informative review of the historical evolution of the relationship of developing countries to the multilateral trading system, a discussion that helps clarify the lines of the debate as they are drawn today. Keck and Low distinguish several elements in the case typically made for SDT. Concerns about “graduation”—the definition of which indicates the circumstances under which countries cease to qualify for special treatment—have greatly complicated progress on this issue. The authors argue for a more analytical approach that would define SDT eligibility automatically in relation to the use of specific policy measures or instruments rather than on the basis of general national characteristics or criteria.

In chapter 6 Çağlar Özden and Eric Reinhardt focus on the most visible form of SDT, unilaterally granted preferential access to rich country markets through the generalized system of preferences. From a systemic perspective, preferences create a challenge, as they violate the nondiscrimination principle. They may also impede the liberalization of tariffs on a most-favored-nation (MFN) basis, due to fears of “preference erosion,” as MFN tariff reductions diminish the value of any used preferences. There is therefore a danger that substantial progress on MFN-based market access in the Doha or subsequent rounds will be impeded

because of concerns by some beneficiary countries that progress will erode the value of existing nonreciprocal preferential access. Similar incentives are created by agricultural subsidies. Some developing countries are indirectly benefiting from OECD domestic support policies because they have preferential access to protected markets—the European Communities’ sugar regime is an example. These preferences create incentives for some developing countries to support OECD farm interests, at the cost of less global integration.

The evidence summarized by Özden and Reinhardt suggests that preferences have not been a very effective development tool. The policy recommendation is not to seek to maintain preference margins (and, therefore, not to slow down or stop MFN liberalization) but for donor countries to shift to more efficient and effective instruments of development assistance. One option would be for OECD countries to help developing country beneficiaries adjust through instruments that directly support incomes (that is, instruments targeted at affected farmers and firms and decoupled from past production levels). More generally, what is required is assistance to help affected countries deal with the associated adjustment costs by supporting diversification into other activities, retraining workers, and so forth. Numerous models and analyses demonstrate that the gains from trade reform outweigh any losses. Thus mechanisms must be created that transfer some of these gains into the financing needed to provide such assistance.⁹

In chapter 7 Faizel Ismail argues that SDT—comprising preferences and exemptions or longer transition periods for developing countries—constitutes too narrow an approach toward integrating development considerations more centrally into the WTO. He argues that the development dimension of the trading system includes four major elements: fair trade (defined as equality of opportunity), the capacity to trade, balanced rules that conform to principles of social justice and equity, and good governance (open, transparent, and participatory decision-making procedures and processes). He notes that progress has been made on all four fronts, reflecting the active engagement by developing countries in the negotiating process and the activities of the WTO. Of particular importance has been the rise of developing country negotiating coalitions—the G-20, the African Union, the LDC group—as well as the more general recognition that trade policy is just one element of a development strategy.

Deciding on a new framework for development in the WTO could do much to move the market access agenda forward and facilitate improvements in domestic regulatory policies where members agree that cooperation is beneficial. But, Ismail notes, more is needed to build capacity and allow poor countries to participate fully in the system. Given the huge disparities in trade capacity, a key need is for financial assistance to bolster trade-related institutions and enhance the competitiveness of firms and farmers in developing economies.

This is the subject of chapter 8, by Susan Prowse. She argues that there is a strong case for additional support for the adjustment to trade reform and integration, on both economic and political grounds. Without more aid, she believes, multilateral liberalization on a nondiscriminatory basis will be impeded. At the same time, taking advantage of improvements in market access will entail additional domestic policy reform to facilitate trade as well as trade-related capacity building. A successful Doha Round will generate significant aggregate gains in developed countries. Given the global public good nature of an ambitious WTO-based outcome, increasing financial support (representing a small increment of the likely gains) to facilitate trade, sustainable growth, and convergence of poor countries is a win-win policy prescription. Prowse considers various options for mobilizing increased support and improving aid effectiveness in the trade area. In terms of the operational structure, she recommends building on existing structures, in line with the basic principles of the Integrated Framework for Trade-Related Technical Assistance.¹⁰ Prowse makes a strong case for increased resources to be considered and disbursed in the context of a country's macroeconomic and development strategy. As such, issues relating to the absorptive capacity and likely exchange rate and competitiveness impact of larger aid flows—considerations that are essential to any increase in aid—can be taken into account.

1.1.3 Part III: Rules and Enforcement

The first Ministerial Meeting of the WTO was held in Singapore in December 1996, at which time a work program was agreed to for the following years. Certain high-income countries sought to put government procurement, trade facilitation, competition, and investment policy on the WTO agenda, with a minority (led by France and the United States) also seeking to introduce the topic of labor standards. Many developing countries strongly opposed including labor standards, and the issue was kept off the WTO agenda. Members did agree to create working groups to discuss and study the relationship between trade and competition and investment policy disciplines, transparency in government procurement, and trade facilitation.

At the Doha Ministerial Meeting in 2001, proponents of WTO disciplines in these areas suggested that they be put on the negotiating agenda of the new round. Many developing countries were not convinced that this step was in their interest; a last minute compromise involved an agreement that negotiations on these four “Singapore” issues would commence after the 2003 meeting of WTO ministers. Based on an intervention by India, it was specified that a precondition for such negotiations was “explicit consensus” among WTO members on the modalities.

The four working groups on the Singapore issues commenced work in 1997. In each case they examined the relationship between trade and the relevant policy

area.¹¹ This process enhanced the understanding of WTO members of the relationships concerned, but it did not narrow the differences in views between the leading industrial nations and subsets of developing countries regarding the merits of negotiating and enforcing multilateral disciplines in the four areas. Matters came to a head at the WTO Ministerial Meeting in Cancun. The European Communities, Japan, and the Republic of Korea were the primary *demandeurs* for negotiations on all four topics. Three groups of developing countries—the African Union, the LDCs, and the African, Caribbean, and Pacific group of countries—had all agreed at the ministerial level before Cancun that they did not support launching negotiations on any of these topics. They were joined by a number of middle-income countries, such as Malaysia. Some countries argued that these were marginal issues, with only limited benefits for developing countries; that they could give rise to potentially significant implementation costs; and that they would divert scarce negotiating resources and political attention away from the more important market access agenda. While many middle-income economies, including most Latin American countries, did not have serious concerns about launching negotiations on these issues, it was clear that an “explicit consensus” did not exist in Cancun.

Despite a last minute offer by the European Communities to drop investment, competition, and (perhaps) transparency in government procurement, the G-90 (an alliance of the African Union, the LDCs, and the African, Caribbean, and Pacific group of countries) would not agree to negotiate any of the Singapore issues. With the adoption of the Doha Work Programme by the WTO’s General Council in August 2004, agreement was eventually reached to launch negotiations on trade facilitation matters only. In principle, nothing rules out discussions on the other three topics at the WTO, but negotiations will not take place on them for the duration of the Doha Round.

The chapters in part III analyze different regulatory policy areas in which multilateral rules either already exist (procurement), are being sought (trade facilitation), or could be sought (new disciplines on investment incentives, an agreement to ensure greater access to knowledge). The focus of these chapters is either on the (potential) gains from international cooperation for developing countries in the areas studied or on enforcement, a key condition for agreements to have value. Enforcement has been a major concern of developing countries, as their limited capacity to identify and contest perceived violations of agreements can reduce the value of engaging multilaterally.

In chapter 9 Krista Lucenti reviews the state of play on trade facilitation negotiations in the WTO as of early 2005 and the rationale for stronger multilateral disciplines. She describes the key economic issues at hand, stressing that changes in global trading patterns have reinforced the momentum for reforms to improve trade facilitation; highlights the significant overlap created by the programs of

numerous intergovernmental and regional organizations dealing with trade facilitation matters; summarizes the major submissions made to the WTO on trade facilitation; and assesses arguments for and against further multilateral rules on trade facilitation. Lucenti argues that there is a strong case for WTO disciplines on trade facilitation. In instances where disciplines would pose implementation problems for developing countries, no doubt much will be made of the link (embodied in the agreed-on negotiating modalities on trade facilitation) between the availability of aid and the enforcement of obligations on developing countries.

In chapter 10 BVR Subrahmanyam discusses the use of investment incentives by WTO members—a policy area for which there are some multilateral disciplines but no explicit rules. Such incentives are a commonly used policy tool for attracting FDI, but they distort international investment and production decisions. A new database, compiled by the author, on the use of investment incentives is employed to document the widespread use of investment incentives. Subrahmanyam finds that developing countries use fiscal incentives much more than direct financial incentives (subsidies), suggesting that they have a negotiating interest in starting with disciplining financial incentives. He also reviews the current WTO rules that may affect investment incentives (or be used to contest them), concluding that these are essentially nonbinding. In his view, this is one dimension of the investment policy agenda where multilateral rule making would be beneficial to developing countries.

In chapter 11 John Barton and Keith Maskus focus on an emerging problem that may impede the access of poor countries to knowledge: the fact that information that has traditionally been in the public domain is increasingly becoming protected and may no longer be freely accessible. They propose and discuss the economic foundations for an Agreement on Open Access to Basic Science and Technology. Such an agreement could be structured around open access for knowledge inputs (that is, the coordination and movement of research projects and scientific personnel), open access to outputs (basic research results), or both; it could be founded on standard WTO principles, including provisions for preferential treatment for developing countries. The central purpose of such an agreement would be to ensure widespread access to essential scientific results and to enhance the transfer of basic technological information to the developing world at reasonable cost.

The motivation for proposing such an agreement is threefold. First, there is concern that government restrictions on access to data and research results could harm the pace of global scientific advance and the diffusion of knowledge, particularly to the detriment of transition economies and developing countries. There is an increasing policy trend toward making knowledge a private commodity, despite its inherent character as a public good, raising fundamental questions for science, education, and the diffusion of information.

Second, despite the promise held out by TRIPS that stronger technology protection would expand flows of knowledge to poor countries, very few gains have emerged in this regard. At the same time, the exclusive rights offered to intellectual property owners by TRIPS have the potential for limiting access of developing countries to publicly-generated basic research that might spur competition and local innovation.

Third, the economics of knowledge creation and the nonrival nature of information imply that global investments in basic science and technology are underfunded relative to the global optimum. Knowledge is a prime example of a global public good that can be more effectively provided by cooperative multilateral actions. A major objective of an Agreement on Open Access to Basic Science and Technology would be to help preserve and enhance the global commons in science and technology while establishing a public mechanism for increasing the international flow of technical information without unduly restricting private rights in commercial technologies.

The next two chapters turn to the implementation and enforcement of agreements. In chapter 12 Simon Evenett and Anirudh Shingal focus on the implementation by Japan of the Agreement on Government Procurement (GPA). This is a so-called plurilateral agreement, which binds only signatories, one of only two such agreements in the WTO. The GPA is of interest because it has both very specific requirements regarding the process of procurement—to ensure that foreign bidders have an equal opportunity to bid—and imposes detailed annual reporting requirements on members with a view to facilitating the monitoring of compliance with its rules.

One test of an international trade agreement's worth is its ability to provide sufficient disincentives to signatories to renege on commitments when faced with domestic pressures to do so. The period analyzed in chapter 12 is one during which Japan was in a prolonged recession. Using the data reported by Japan to the WTO, Evenett and Shingal show that the share of Japanese government procurement contracts above GPA-specified thresholds fell between 1997 and 1999. Furthermore, the proportion of total contracts awarded to foreigners in 1998 and 1999 was lower than in 1990 and 1991. In the absence of these changes, the value of contracts awarded to foreign firms would have been some 25 percent higher in 1998 and 1999. Arguably, then, in the case of Japan the GPA failed to perform its function. This type of analysis is not undertaken by GPA members, but it illustrates one way in which greater use of reporting requirements, combined with economic analysis, could be used to assist smaller countries that do not have the capacity to monitor compliance or initiate formal disputes to defend their rights.

In chapter 13 Kyle Bagwell, Petros Mavroidis, and Robert Staiger focus on a specific constraint that affects the ability of small, poor countries to make effective

use of the WTO dispute settlement procedures: the fact that, by definition, these countries cannot credibly threaten retaliation against large countries that renege on previously negotiated commitments. They document that there have been a number of cases where developing countries could have retaliated, but did not, whereas developed countries do avail themselves of their retaliation rights. An innovative proposal to address this problem was submitted to the WTO by Mexico in 2003. It suggests that WTO members be permitted to trade their rights for retaliation in instances in which a losing party refuses to implement a WTO panel (or Appellate Body) report. The authors analyze the economics of this proposal, which they argue is the most ambitious and innovative one to have been made in the history of the GATT/WTO. They note that something along the lines proposed makes sense from the perspective of developing countries, given that several dispute resolutions have not been implemented by large trading partners. They conclude that a slightly augmented version of the Mexican proposal would have the greatest potential return for the developing country that auctions off its retaliation rights, especially if the violating party also has the right to bid.

The authors stress that their analysis does not imply that introducing the possibility of tradable remedies into the WTO system is necessarily a good idea, given the likely political ramifications of a government imposing WTO-sanctioned retaliatory tariffs against other governments with whom it had no unresolved WTO dispute. However, they note that similar observations can be made about any attempt to bring multilateral elements into WTO dispute resolution in order to help small and developing countries take part more effectively in the WTO system.

1.1.4 Part IV: Issue Linkages

The WTO, as the GATT before it, relies on large rounds of negotiation with crowded agendas. Many matters are put on the table in an effort to create a negotiating set that allows for a package of agreements to be negotiated that taken together raises the welfare of every WTO member. Starting in the Uruguay Round, calls were made that large rounds were inefficient, taking too long to come to closure and bearing the risk that outcomes would not be beneficial to all countries. Particularly controversial has been the so-called Single Undertaking rule used in the Uruguay Round.

In chapter 14 Philip Levy analyzes the pros and cons of the Single Undertaking, under which the final outcome of a multilateral round is a package deal that all must accept on a take-it-or-leave-it basis. Levy argues that linkages across issues are a central component of international trade negotiations. This is true whether one considers governments as unified entities promoting national welfare or takes into account the role of interest groups in shaping government preferences. The

fact that the landscape of negotiations has changed, with issues that were once considered domestic making their way onto the agenda, complicates but does not diminish the possibility of cross-sectoral trade-offs and issue linkages. While the added complexity puts a greater burden on negotiating countries, a broad round is preferable to a narrow one, Levy argues, because it may allow otherwise unattainable deals to go through. Countries' own efforts to ensure that their concessions are offset by gains should be sufficient to ensure the breadth of participation. However, Levy also concludes that an attempt to impose a Single Undertaking requirement would likely fail. An implication is that strengthening provisions of the WTO to recognize development differences may be a necessary condition for continued progress and expansion of the coverage of the agenda, which in turn may be necessary to maintain international cooperation on trade.

The discussions in the working groups on the Singapore issues during 1997–2003 suggest that one way forward on behind-the-border regulatory policies—which clearly will not cease to be of interest to stakeholders and where there are certainly potential gains from international cooperation—may be a longer process of “softer” forms of cooperation. A precondition for agreeing to binding rules in an area is a clear understanding of the associated net benefits. While research of the type included in this volume can and should help generate such understanding, Bernard Hoekman and Kamal Saggi suggest in chapter 15 that a period of voluntary cooperation and regular interaction of the stakeholders in a specific issue area can be a fruitful, if not necessary, intermediate step along the way to defining binding multilateral rules. In their view, such cooperation need not occur in the WTO.¹²

Their focus is on the WTO discussions on competition policy. For an international agreement that relies on binding enforcement to be beneficial, it must either offset a negative spillover imposed by other countries or help governments overcome domestic political economy constraints that impede the adoption of welfare-enhancing policy changes. In principle, both conditions are satisfied in the competition policy context for developing countries. Although market access impediments resulting from anticompetitive behavior by firms can and should be dealt with by domestic competition authorities, in many countries institutional weaknesses may impede the authorities from doing so. One solution is to assist such countries through education (learning through information exchange and so forth) and technical and financial assistance. The question arises as to whether the WTO is the most effective and efficient venue for such activity. Hoekman and Saggi conclude that it probably is not, given that other organizations have more experience and capacity in this area.¹³

They argue that there could have been a potential negotiating agenda, favorable to developing countries, that is justifiable in terms of classic international

spillovers—disciplines requiring industrial countries to preclude anticompetitive practices that have effects on developing country markets. They note that it is ironic that in areas where there clearly are spillovers and potential gains from more binding forms of cooperation—such as requiring competition authorities in developed countries to take the interests of affected developing countries into account in merger decisions, disciplines on export cartels and enforcement action against international cartels, replacement of antidumping law with competition law—actual proposals by WTO members were either quite weak or nonexistent. The reason for this is that it would come at a cost to the *demandeurs* of competition policy rules in the WTO. The implication is that any move in this direction would require a significant quid pro quo on the part of developing countries, one that goes beyond a general willingness to adopt and enforce competition legislation.

1.2 Concluding Remarks

The WTO is a critically important multilateral forum for cooperation between sovereign states on economic policies, not least because of the impact of economic policies on prosperity in an interdependent world. Open economies necessarily care about policy choices in trading partners, choices that are often the outcome of political processes, which in turn reflect the perspectives of narrow economic interests. It has long been appreciated that international trade agreements can help policy makers overcome the groups that frustrate unilateral reform.

The GATT/WTO negotiating process has proven effective in harnessing the reciprocal exchange of market access concessions to support economic growth. Much still remains to be done when it comes to the bread and butter of the WTO—increasing market access and disciplining trade-distorting policies that impose significant negative spillovers on trading partners. Merchandise and services trade barriers remain relatively high in many developing countries, and many countries have plenty of room to bind past unilateral reforms in the WTO. Although the trend toward integration on behind-the-border policies will undoubtedly continue—assuming there is no breakdown of multilateral cooperation on commercial matters—it should be borne in mind that this is not yet a *sine qua non* for progress to be made on liberalizing traditional trade policies. In particular, there is a substantial outstanding agenda to trade “concessions” on access to service markets. The contributions in this volume make clear that the WTO will continue to be an important pillar of global economic cooperation and support the economic development of its poorer members through attenuation of negative cross-border spillovers associated with the use of trade-related policies. The contributions also illustrate that the potential relevance of the WTO for development can be enhanced, however, if progress on market access is complemented by

a more flexible, less legalistic approach to the pursuit of international cooperation on regulatory policies.

Moreover, more effective integration of the poorest countries into the trading system requires instruments aimed at improving the productivity and competitiveness of firms and farmers in these countries. Supply constraints are the primary factors that have limited the ability of many countries to exploit trade opportunities. This suggests improving trade capacity and encouraging diversification are a priority. In part this can be pursued through a shift to more (and more effective) development assistance that targets domestic supply constraints, as stressed by Prowse in her chapter. Complementing further global trade reform efforts with additional aid for trade is also important because ambitious trade agreements will generate adjustment and implementation costs. If these costs are not addressed credibly, the likelihood of an ambitious outcome will be much lower. The better the mechanisms to handle adjustment problems and compensate losers—including policies to support the investment climate needed to generate new employment opportunities—the more feasible it becomes to undertake trade-related reforms and make international policy commitments. Adjustment costs and the losses created by preference erosion are not matters that can, or should be addressed by “managing” trade policy. What is needed is to use instruments that target the problems directly.

These insights are not new, the arguments have been well known for a long time (Bhagwati 2004). What is often missing is a credible commitment to address the political economy constraints that lead governments to (continue to) use trade policy instruments. An expansion in dedicated aid for trade could make a big difference if it is appropriately conditioned and managed to ensure that it addresses national trade-related priorities, whether adjustment- or supply side related. Deep multilateral, nondiscriminatory trade liberalization has the characteristics of a global public good. Doing more to redistribute some of the gains from trade to those who stand to lose from trade agreements that on average are globally welfare improving would help the WTO fulfill its potential.

Notes

1. See, for example, Wolf (2004).

2. Much of this debate emerged just before and after the 1999 WTO Ministerial Meeting in Seattle. Finger (2002) and Finger and Winters (1998) provide good discussions of the key questions. See Helleiner (2000), Hilary (2002), Oxfam (2002), and Rodrik (2001) for arguments and proposals that development considerations be made a more integral part of the WTO. For comprehensive treatments of the trade and development agenda, see UN Economic Commission for Africa (2005) and UN Millennium Project (2004).

3. On several occasions before the 2003 Cancun Ministerial Meeting, the European Commission argued that multilateral rules on competition, investment, facilitation, and procurement policies

would have systemic value (that is, be of general benefit to all WTO members) and as such should not require reciprocal concessions on its part. This argument did not find much favor with many used to the give-and-take of negotiations at the WTO.

4. This volume does not address two major subjects—regional trade agreements and contingent protection. Schiff and Winters (2003) summarize a major research effort by the World Bank on regionalism and development. Contingent protection is the subject of a companion volume in this series edited by Finger and Nogués (2005).

5. Of course, no generalizations are possible here. At the household level much depends on whether people are net consumers or producers of food and on the relative size of the income and consumption impacts of policies.

6. The emphasis in negotiating the Uruguay Round Agreement on Agriculture was not to liberalize agricultural policies per se but to establish a framework for further liberalization of these policies in future negotiating rounds. Martin and Winters (1996) argue that “a major achievement of the agreement was to convert virtually all agricultural nontariff barriers into tariffs subject to agreed maximum rates (the so-called tariff bindings)” (3). They note that little reduction in the market access barriers was negotiated in the Uruguay Round; indeed, some WTO members used the process of converting nontariff barriers to tariff barriers to set very high tariff bindings. Martin and Winters conclude that “this [opportunistic conversion process] will not recur, and so the Uruguay Round has provided the foundation for more extensive liberalization in future rounds” (6).

7. For summary descriptions of formulas approaches that have been pursued in past negotiations, see Laird and Yeats (1987) and Panagariya (2002).

8. For a survey of the analytical and empirical literature, see Blonigen and Prusa (2004).

9. For discussions of alternative options to increase the effectiveness of SDT, see Hoekman (2005), Page and Kleen (2004), and Stevens (2002). Hoekman and Prowse (2005) discuss specific options for addressing preference erosion.

10. The main purpose of the Integrated Framework is to generate a broad-based policy agenda for trade and growth consistent with a country's development strategy and to prioritize capacity-building needs to which bilateral and multilateral donors respond. A consortium of development partners, the Integrated Framework links the international financial institutions with the UN system (trade development) and the WTO (trade rules). Its basic principles promote the “emerging new aid framework,” which calls for greater donor harmonization (both bilateral and multilateral) and additional aid to be provided in the context of a country's overall development strategy and to support poverty reduction objectives. The Integrated Framework is also working to bring in other key stakeholders, notably the private sector.

11. The contributors to Evenett and SECO (2003) describe the principal contributions to each of these four working groups and the reaction of WTO members to proposals for further multilateral disciplines.

12. For a more general discussion of the potential role of a “soft law” approach to international cooperation, see Abbott and Snidal (2000).

13. Evenett and Hoekman (2005) advance similar arguments for further international cooperation in the area of government procurement.

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PART I

POLITICAL ECONOMY OF MARKET ACCESS

REFORMING AGRICULTURAL POLICIES IN THE DOHA ROUND

Patrick A. Messerlin

Agriculture is crucial for developing countries, particularly the poorest ones, where it contributes 40 percent of gross domestic product (GDP), accounts for 35 percent of exports, and employs 50–70 percent of the labor force.¹ Agriculture is particularly important for the poorest people in all developing countries: roughly 70 percent of the world's poorest people live in rural areas, with the proportion in the poorest countries running as high as 90 percent (Aksoy and Beghin 2005).

Reducing poverty requires improving the economic situation of the farm sector and rural areas in developing countries. Current farm policies that support prices and subsidize agricultural production in Organisation for Economic Co-operation and Development (OECD) countries distort trade and investment incentives by depressing world prices and preventing developing countries from exploiting their comparative advantage. It is not surprising therefore that agriculture is widely seen as the linchpin of the Doha Round.

WTO negotiations on agriculture were launched in March 2000, in accordance with Article 20 of the Uruguay Agreement on Agriculture (URAA). Coming just four months after the 1999 Seattle Ministerial debacle, the agreement (quite unexpectedly) sent a clear signal that the World Trade Organization (WTO) had

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survived its first crisis. From March 2000 to March 2001, 45 proposals from 106 countries were tabled on a wide range of subjects in seven meetings. This first phase led to the two paragraphs in the Doha Ministerial Declaration on agriculture. The language in the declaration constituted a good basis for negotiations, because it covers all forms of protection, from tariffs to subsidies of all kinds.

Things quickly deteriorated after the Doha Ministerial. Many observers perceived the European Community's insistence on including terms such as "without prejudging the outcome of negotiations" or "with a view to" in the Doha Ministerial Declaration as key reservations or a bad omen about the Europeans' willingness to negotiate. Six months after Doha, the United States adopted the 2002 Farm Bill, widely perceived as a big step backward. Two months later the strong French opposition to the proposal by the European Communities (EC) for reforming the Common Agricultural Policy (CAP) struck a new blow to hopes raised in 2000–01. The roller coaster ascended once again in late July, however, when the United States tabled relatively bold proposals about reducing or eliminating a wide range of instruments of protection.

Throughout 2002–03, the story of the Doha Agenda was one of missed deadlines and mounting frustration. The March 31, 2003, deadline for the agreement on the modalities for the agriculture negotiations passed without agreement. No progress was possible until the EC agreed internally on the latest reform of the CAP, which did not occur until June 2003. When it did, the reform proved underwhelming and provided little impetus for the talks. In July 2003, in an effort to break the stalemate, members asked the European Union (EU) and United States to come up with a joint proposal on agriculture. As in the Uruguay Round, many members expected that the United States would push the European Union in the direction of liberalization. This did not happen—instead, the United States moved toward the EU position (see Blandford 2001 for a prescient analysis of the likely convergence of U.S. and EU positions). When their agreement emerged in August, it surprised and dismayed many as a minimalist text that served largely to preserve existing protection in both parties. The deal not only failed to move negotiations forward, it contributed to a growing climate of mistrust, bringing the roller coaster to a sudden halt.

The absence of progress on agriculture, widely viewed as the key promise of the "development" round, obstructed progress on other issues. For many countries, the difference between the level of ambition in the U.S. and EC proposals for reducing protection in agriculture and nonagricultural issues was all too stark. The web of deliberately interlinked deadlines established in the Doha Agenda was rapidly degenerating into gridlock. Cancun failed to break the deadlock, and only in July 2004, after a U.S. initiative to get the talks back on track, did it prove possible to agree on a negotiating framework for the remainder of the round. While only laying

down the basic pillars in the form of a “framework” for future talks, the framework for agriculture nonetheless represents a significant advance from the U.S.-EU text submitted before Cancun and the months of deadlock that followed. Since then a series of meetings has not made enough progress to be able to exclude the possibility of a major setback at the Hong Kong Ministerial, to be held in December 2005.

This chapter discusses the political economy of agricultural reform and international negotiations. The focus is on OECD countries, because these are the main trouble makers and because comparable data are not available for developing countries. Section 1.1 looks at what happened as a result of the URAA—ultimately very little—and summarizes recent developments on the agricultural trade policy front in the European Union and the United States. Section 1.2 turns to the driving forces that lie behind current protection in agriculture. Section 1.3 discusses the contours of an emerging environment that may be more favorable to the formation of coalitions that will support agricultural reforms through WTO negotiations. The chapter does not discuss WTO negotiation modalities and options, two areas that have been the subject of extensive and ongoing research. A detailed discussion of what would make sense from a global welfare and a development point of view can be found in the final report of the UN Millennium Project Task Force on Trade (UN 2005). The focus of this chapter is on how to get from here to there. Doing so requires understanding the political economy forces that underlie current policies and mobilizing interest groups that are harmed by these policies.

1.1 Failure of the URAA and Developments since 1995

The URAA did not deliver the liberalization dynamics it was supposed to generate.² It may even have put the Doha negotiators in a situation worse than that faced by the Uruguay Round negotiators a decade ago. This is because today, many farmers and a noticeable share of the public opinion in protectionist OECD countries are convinced that agriculture was liberalized by the Uruguay Round and that this liberalization has been the cause of their difficulties since 1995. This belief is wrong. As shown below, no liberalization has occurred since 1995, and farmers’ current difficulties are mostly self-inflicted by domestic farm policies. From a political perspective, the mismatch between Doha negotiators’ goal of liberalizing agriculture and the public’s view that liberalization has already occurred and has hurt welfare could not be worse.

1.1.1 Support to Agriculture Since 1995

The URAA approach was initially very appealing (for a thorough analysis of the agreement, see Tangermann 2001). In 1995 the Uruguay Round negotiators

(and most trade observers) were perfectly aware that the liberalization required by URAA would be minor. They were the first to witness, during the last months of the Uruguay negotiations, WTO members deliberately overestimating the level of farm protection for the reference period (1986–88) in order to end up with an almost unchanged level of protection at the end of the transition period (2001) (see OECD 2001). But pro-reform-minded Uruguay Round negotiators were convinced that the transparency introduced by the new instruments of protection (the “tariffication” process) would reveal to the public the astronomical level of farm protection in most OECD countries. They hoped that this information would be enough to change the balance between vested and pro-free trade interests, allowing subsequent negotiations (mandated to start in 2000) to finally start serious talks on liberalization. Unfortunately, the magic of transparency did not work, for several reasons.

During the last weeks of the Uruguay negotiations, WTO members worked hard to undermine the transparency that they previously had decided to include in the agreement. They relied heavily on specific tariffs (tariffs denominated as a fixed sum per unit of product, such as €300 per ton of rice) rather than *ad valorem* tariffs (which are expressed as a percentage of the import price). The European Union and the United States imposed specific tariffs on one-third of their farm products. These specific tariffs are devastatingly protectionist, because they automatically increase the level of protection when world prices are low (that is, when protection is very much sought after by domestic farmers). They subjected tariff-rate quotas (introduced by the Uruguay Round negotiators in order to ensure a minimum opening of farm markets in instances where tariff protection was prohibitively high) to opaque legal procedures that have systematically kept quota fill rates at a low level. They also played with the concept of “unused” subsidies and with forward mechanisms for loosening as much as possible the negotiated disciplines on export and other subsidies. Developing countries limited the real value of their commitments by setting their “bound” tariffs (which cannot be raised without compensating the affected trading partners) at a much higher level than their applied tariffs, so that, if necessary, they could rapidly and massively increase their applied tariffs without being subject to any multilateral constraints. The weak disciplines on tariffs, coupled with very limited restraints on export subsidies and domestic price support, prevented any real reform of farm trade from taking place.

But there was more than simply “dirty” tariffication in the last weeks of negotiations. Total support to agriculture as a share of GDP substantially decreased during the late 1990s relative to 1986–88 (the period adopted by the URAA as reference years, because it witnessed the highest level of farm support) (table 1.1).³ This decline did not reflect a successful agreement, however. Rather, it largely mirrored the decrease in the share of farm gross value-added in GDP during the same

period. As a result, the share of total support to agriculture in farm gross value-added declined only slightly in the OECD region, from 84.8 to 60.0 percent. More important, the level of support remains at an extraordinarily high level, since it still accounts for almost two-thirds of farm gross value-added. As a result, as Diakosavvas (2001) shows, the URAA has had very modest quantitative effects on OECD farm trade flows.

This limited decline has two exceptions. The first is the OECD countries that can be qualified as “free traders” on farm issues (Australia and New Zealand), which provide much less support to agriculture today than they did during the reference period. In New Zealand the 80 percent decline in the total support share in farm gross value-added has led to a growing farm share in GDP, bearing out the title of a booklet on its experience, *There Is a Life after Subsidies*. In Australia the more limited (two-thirds) reduction in total support in farm gross value-added was accompanied by a decline in the farm share in Australian GDP that was substantially smaller than the decline in the protectionist OECD countries.

The second exception, in the opposite direction, is the sharp increase in the total support share in farm gross value-added in the new and lower-income OECD members—Hungary, Mexico, Poland, and Turkey, with Hungary providing support that exceeds levels in the EC. This pattern suggests the existence of dynamic forces that could systematically work against freer trade in agriculture: as soon as a country becomes industrial and rich enough, it heavily protects its farm sector. If confirmed, this evolution in emerging economies (noted by Anderson 1994) will negatively affect the Doha Round and future WTO rounds.

Table 1.1 provides two crucial lessons for efforts at coalition building aimed at promoting reform. First, meaningful WTO negotiations require comparable data and a focus on all instruments of protection. Focusing only on one instrument makes no sense, because a large portion of protection granted by OECD countries is channeled through border protection. This protection is less transparent and more distorting than subsidies. Ignoring the fact that developing countries often heavily tax their farmers would compound the errors. An implication is that Doha Round negotiators require comparable data on variables such as the ad valorem equivalent of specific tariffs as well as subsidy programs, including for developing countries. Currently such information, while incomplete, is available only for the OECD countries.

Second, two forces are working in opposite directions in the protectionist and “middle-of-the-road” OECD countries. On the one hand, the share of agricultural labor in the total labor force is declining substantially. One should expect this evolution to be favorable to farm liberalization, because it implies less political leverage by the dwindling number of farmers. On the other hand, the share of food in

TABLE 1.1 Total Support, Value-Added and Labor in Agriculture, and Food in Total Consumer Expenses, Selected Countries and Years

	Total support estimate in % GDP ^a			Farm gross value- added in % GDP ^a	
	1986–88	2002–04	2004	1986–88	2003
Protectionists					
Korea, Rep. of	9.3	3.5	3.4	10.4	3.6
Japan	2.3	1.4	1.3	2.8	1.3
Norway	3.5	1.4	1.3	3.3	1.4
European Community (15)	2.8	1.2	1.2	3.3	2.0
Hungary	2.5	2.8	2.4	5.8	3.3
Poland	2.2	1.2	0.8	9.9	3.0
Czech Republic	4.4	1.5	1.5	6.5	2.8
Switzerland	3.9	1.8	1.8	2.1	1.3
Middle of the road					
United States	1.3	0.9	0.9	1.8	1.6
Canada	1.8	0.8	0.8	2.8	2.3
Turkey	3.9	4.4	4.1	18.2	11.9
Mexico	0.7	1.2	1.0	6.1	3.8
Free traders					
Australia	0.8	0.3	0.3	4.3	3.4
New Zealand	1.7	0.4	0.4	7.0	8.7
OECD	2.3	1.2	1.2	2.9	2.0

consumers' total expenditure is also decreasing substantially over time. This evolution implies that consumers have less powerful incentives to oppose costly protection on agricultural imports, as the impact on their expenditures is small. Thus there is no strong reason to believe that the net political balance on farm issues between producers and consumers has changed much in OECD countries. One could even argue that the net balance may have shifted in favor of farmers, to the extent that total support includes expenses for nontrade concerns (food safety, environment) that are increasingly highly valued by some people in rich countries or that many taxpayers dare not oppose. In other words, trade negotiators should not count too much on final consumers and taxpayers, the natural supporters of liberalization. They should look for other allies and arguments, as suggested in section 1.3.

TABLE 1.1 (Continued)

TSE in % GVA		Agricultural labor as % of total labor		Food as % of total consumer expenses	
1986–88	2002–04 ^b	1986–88	2003	1986–88	2002
89.4	97.2	22.1	8.8	25.7	14.2
82.1	107.7	8.2	4.6	—	14.4
106.1	100.0	6.8	3.7	15.3	12.5
84.8	60.0	7.6	3.8	19.0	12.6
43.1	84.8	9.9	5.6	—	19.0
22.2	40.0	26.5	18.4	32.7	19.4
67.7	53.6	11.4	4.5	27.0	17.5
185.7	138.5	5.3	4.1	—	11.0
72.2	56.3	3.0	1.7	8.7	6.1
64.3	34.8	5.2	2.9	12.1	9.9
21.4	37.0	47.3	33.8	—	—
11.5	31.6	26.8	15.8	25.1	21.1
18.6	8.8	5.9	4.0	15.2	10.5
24.3	4.6	10.4	8.1	12.4	16.7
79.3	60.0	9.6	6.1	14.9	10.7

Source: OECD 2005.

Note: GVA = gross value added for agriculture, forestry, and hunting; TSE = annual monetary value of overall transfers associated with agricultural support to farmers; — = not available.

a. For the Czech Republic, Hungary, and Poland, figures for the column 1986–88 are for the closest available years (early 1990s).

b. Ratio (TSE/GDP 2002–04)/(GVA/GDP 2003).

1.1.2 The Level and Structure of Farm Protection in Selected OECD Countries

The aim of the URAA was not to lower total support to agriculture but to reduce international distortions in farm outputs and trade flows. In this context, concepts narrower than total support—namely, producer support and consumer support—are better indicators of the failure of the agreement.⁴ Table 1.2 gives the producer support estimates (PSEs) and the consumer support estimates (CSEs) in the form

TABLE 1.2 Assistance to Agriculture Since the Uruguay Round, Selected Countries

	PSE-based NACs		CSE-based NACs	
	1986–88	2002–04	1986–88	2002–04
Protectionists				
Czech Republic	49	35	67	22
European Comm. (15)	71	52	61	27
Hungary	20	39	41	25
Japan	158	137	136	106
Korea, Rep. of	239	172	192	152
Norway	245	252	134	136
Poland	13	17	6	13
Switzerland	359	241	288	136
Middle of the road				
Canada	57	29	28	18
Mexico	39	26	30	18
Turkey	20	34	20	28
United States	28	21	3	–5
Free traders				
Australia	9	5	9	0
New Zealand	13	2	10	9
OECD	60	44	47	27

of average nominal assistance coefficients (NACs) for selected OECD countries. As PSE-based nominal assistance coefficients and CSE-based nominal assistance coefficients measure the wedge between domestic and world prices as a percentage of the world prices, they have the great advantage that they can be read in the same way as ad valorem tariff rates. For instance, in 2002–04 the tariff-like PSE-based nominal assistance coefficient for the Republic of Korea was 172 percent and the CSE-based nominal assistance coefficient was 152 percent.⁵

Table 1.2 confirms how little things have changed since the URAA. PSE-based nominal assistance coefficients have declined in most OECD countries (with the exception of Hungary, Poland, and Turkey, for which they have increased). But they clearly remain at a prohibitive level in the case of all the “protectionist” OECD countries (Hungary, the Czech Republic, and Poland will join the club if the current EC farm policy is not reformed) and in some “middle-of-the-road” countries. In sum, the URAA may have eliminated

TABLE 1.2 (Continued)

Producer support estimate per full-time farmer equivalent in '000 US\$		TRQ fill rates
1986–88	2002–04	1998–00
4	5	54
10	15	64
2	5	41
14	13	66
8	23	70
29	38	63
1	1	34
35	30	90
8	10	85
—	1	100
—	—	—
16	19	73
3	2	93
4	1	42
10	11	—

Sources: OECD 2003, 2005.

Note: CSE = consumer support estimate;

NACs = nominal assistance coefficients;

PSE = producer support estimate;

TRQs: tariff rate quotas;

— = not available.

“redundant” protection, but it did not start to really reduce the effective level of protection.

Table 1.2 provides two more pieces of information that are crucial for the Doha negotiations. The first is the increase in the PSEs per farmer (expressed in thousands of dollars, instead of percentages of the world prices as above). It shows that the average producer support per farmer considerably increased in every OECD country except the two free traders (Australia and New Zealand) and in Switzerland (which started at an extraordinarily high level).⁶ For instance, the average EC producer support per farmer has increased 50 percent since the URAA

reference period, reaching a level equivalent to the French minimum wage. In sum, the remaining farmers in OECD countries are subsidized at an increasingly high level, because their number is decreasing more rapidly than the level of support granted to them. Newspapers and public debates largely ignore this crucial evolution, which could trigger second thoughts among taxpayers.

The second piece of information from table 1.2 is that the fill rates of the tariff-quotas introduced to minimally open farm markets are often low (and declining). The still high level of “traditional” (tariffs and subsidies) farm protection has not prevented the intensive use of the “new” instruments of protection introduced by the URAA. Special safeguard measures (be they volume or price based) allowed by the agreement have been used quite frequently. The more protectionist a country is, the more frequently it uses safeguards.

In sum, Doha Round negotiators are facing the worst of two worlds. The old protection (measured by the PSE- or CSE-based nominal assistance coefficients) is still there, the new instruments of protection are already used intensively, the first opening of the markets by tariff rate quotas has been minimized, and average support per farmer has increased since 1995. Meanwhile, farmers and public opinion in most OECD countries have been convinced—first by trade officials’ speeches immediately after Marrakech, then by antiglobalization leaders’ speeches—that the URAA liberalized agriculture. As a result, they are convinced that any negative evolution in agriculture (from price decreases to food safety issues) is associated with liberalization instead of entrenched protection.⁷

Both the European Union and the United States adopted farm policy reforms after the 2001 Doha Ministerial. Unfortunately, these reforms either went in the wrong direction (the United States) or were largely meaningless (the European Union). Both reforms are due to be revisited in 2006–07, as part of the normal legislative process in the United States and as a step in the enlargement process in the European Union. These reexaminations will offer an opportunity for these two large WTO members to make reform commitments in the context of the Doha Round.

The 2002 U.S. Farm Bill: Turning into Europeans? The U.S. Farm Security and Rural Investment Act (FSRIA) was signed into law in May 2002. The act, which will remain in effect until 2006, reinforces the link between subsidies and production decisions. This is a significant backward step with respect to the previous Farm Bill, the 1996 Federal Agriculture Improvement and Reform Act (FAIR Act), which, in conformity with the URAA, eliminated all mechanisms linking subsidies to production decisions (“decoupling” of subsidies), except for a specific type of deficiency payment (loan deficiency payments). The evolution of the FAIR Act toward economically sound and WTO-consistent decoupled

subsidies was important, because it signaled a serious commitment to a profound reform of U.S. farm policy. The FSRIA has raised serious doubts about this commitment.

The FSRIA reinforces the link between subsidies and production decisions by reintroducing support (“target”) prices for calculating newly created “countercyclical payments.” Target prices are defined for 2002–07 and for a much wider set of crops (cereals, cotton, milk, peanuts, rice, soybeans, and other oilseeds) than those covered by the FAIR Act. Based on these target prices, countercyclical payments insulate U.S. farmers from world prices by providing higher support when world prices drop.

To illustrate the operation of the FSRIA, consider a hypothetical case for wheat in 2004–07. For this period, the wheat target price is \$144 per ton. If the wheat world market price is, say, \$100 per ton, all U.S. wheat producers are eligible for three layers of support: a loan deficiency payment, defined as the difference between the loan deficiency payment rate for wheat (fixed at \$101 per ton) and the world price; a direct payment, fixed at \$19 per ton for wheat; and a countercyclical payment of \$24 per ton, calculated as the difference between the target price and the market price, less the loan deficiency payment and the direct payment.⁸

Although the projected impact of the FSRIA is expected to be limited, the signal it sends is regressive. The expected impact is limited, because when farm prices declined between 1998 and 2002, U.S. farmers lobbied for, and got, ad hoc subsidies on top of those allowed under the FAIR Act. Adding this ad hoc assistance to the “regular” FAIR Act subsidies gives roughly the same amount of support as the total level of subsidies available under the FSRIA. Thus the FSRIA locks in the actual level of support provided since 1998. Moreover, as the FAIR Act removed most supply controls, U.S. farmers have already expanded crop areas to their maximum profitable limits under current prices, limiting the risk of an increased base for payments for the time being. Finally, because of the way countercyclical payments are designed, the effective impact of the FSRIA depends on farm world prices. As these prices increased in 2003–04, actual U.S. subsidies are substantially smaller than FSRIA appropriations.

Despite these restraints on the impact of the act, FSRIA has refueled farmers’ hopes for ongoing farm protection in the United States, further eroding the pro-liberalization U.S. export farm lobbies. This systemic effect is best illustrated by the shift of the largest U.S. farm association (the American Farm Bureau), which in early 2004 voted (by a narrow margin of 204–202) to support only future trade agreements “that prevent economic damage to import-sensitive commodities . . . while advancing U.S. agricultural trade and food security interests,” causing the chairman of the Indiana branch of the Farm Bureau to say, “We are turning into Europeans” (*Financial Times*, January 15, 2004).

The 2003 Luxembourg CAP reform. In June 2003 the European Council adopted the Luxembourg reform of the CAP. Adopted in the 1960s, the CAP was relentlessly expanded until the mid-1980s. Initially based on support for very high domestic prices, it transformed the European Union from a net importer into a large net exporter of farm products by closing European markets to foreign competition and (through export subsidies) dumping European farm products into foreign markets, endangering the farm sectors of many developing countries. The unsustainably large costs of the CAP resulted in a first major reform in 1992 (the McSharry reform). The Uruguay Round was used as an excuse for introducing this reform, a short-term political expediency that proved to be costly in the long run because it induced European farmers to believe that subsequent pain was due to the URAA rather than to the systemic flaws of the CAP. Preparations for the enlargement of the European Union once again revealed these systemic flaws and gave rise to a second major reform (the 1999 Berlin reform).

The most recent 2003 reform introduces a new instrument—single farm payments—which, as early as 2005 but no later than 2007, will replace a *subset* of the existing support measures, namely, the subsidies based on the area planted (cereals, oilseeds) and on the herd size (beef, cows, sheep). As they are based on average production in 2000–02 and do not require actual production of farm products, these single payments are considered as “decoupled” from production decisions. This decoupling was presented as a decisive shift of the CAP toward a WTO-consistent approach based on decoupled support, in sharp contrast with what happened with the U.S. FSRIA.

This hype is not justified. First, only area- and head-based subsidies—which accounted for 21–27 percent of producer support in 2002—will be decoupled. Second, with the exception of milk, the 2003 CAP reform maintains current price supports, which account for most of the EU producer support (58 percent in 2002). Given that for many products, it is price support that determines the actual level of protection, the 2003 reform leaves the current EU level of protection unchanged (OECD 2005).

The 2003 reform significantly reduces support prices for only three products: butter, rice, and rye. Butter is by far the most important one.⁹ The cut in rice price support is interesting, because it is driven by trade policy—it is necessary to honor the EU commitment under the Everything But Arms (EBA) initiative to provide duty- and quota-free access to the EU rice market to developing countries. The rice support price will be reduced by 50 percent in 2004. This will come at a high cost to EU taxpayers, since the single payments for rice will amount to the whole producer support in the sector. The EU market price is projected to decline by 13–33 percent and EU production is projected to fall by 12 percent, but the change

in the world rice price is estimated to be very small (less than 2 percent) (OECD 2005). As current EU protection for rice is determined largely by price support, lowering this support automatically reduces the level of protection on rice imports from countries that are not EBA beneficiaries. In order to eliminate this possibility, the European Union has announced its intention to negotiate import quotas with non-EBA rice exporters.

In sugar, another key commodity for developing countries, in June 2005 the EU Commission proposed cutting support by 40 percent over two years, increasing the EU production quota by 1 million tons, and decoupling support for sugar beet farmers to compensate income losses (equivalent to 60 percent of the price cut). Despite all these measures, the post reform support price will basically align the EU price with the U.S. support price, and it will still be twice the current (and forecast) world price (€421 compared with €160–€200 per ton).

At this stage, the 2003 CAP reform suggests that there will be almost no impact on the level of producer support (in percentage terms) to EU farmers, which is projected to decrease from 57 percent to 55 percent (OECD 2005). By contrast, the reform allows a substantial shift of EU support from the Blue Box (subsidies exempted from reduction under the Uruguay Round because they are under production-limiting programs) to the Green Box (subsidies not deemed to be trade distorting and hence acceptable), if they stay as currently defined (a big if). Similarly, the sum of the domestic subsidies deemed trade distorting (calculated as the URAA Aggregate Measure of Support) and Blue Box subsidies in 2008 would be one-half (in the case of maximal decoupling) to two-thirds (in the case of minimal decoupling) of the corresponding figure in 2003. That is, the 2003 reform allows the European Union to “play boxes” in WTO negotiations, by shifting some subsidies to the Green Box category. It has no effect on import barriers and export subsidies—the core issue for EU trading partners.

Moreover, the 2003 reform relies on systematic “overcompensation”—that is, it pays farmers more than the value of the lost subsidies, as did the 1992 McSharry reform. This flows from the wide difference in terms of transfer efficiency between acreage- or head-based subsidies and single payments. Only €0.25–€0.30 of every euro of acreage- or head-based support goes to EU farmers’ income, as opposed to €0.50 in the case of single payments (OECD 2001). In other words, matching the pre-2003 subsidies would actually have required single payments amounting to only half the current acreage- or head-based subsidies, not the 95–110 percent granted in the 2003 reform on rice and butter. In addition, large EU farmers will—once again—be the main beneficiaries of the reform, because they received most of the acreage- and head-based subsidies during the reference period. The poorest EU farmers will not receive enough income support to leave production,

because they will receive only very limited single payments. Furthermore, by giving funds to large farmers that are not tied to outputs (crop or herd size), the 2003 reform has triggered fears among European farmers, in particular smaller farmers, that large farmers will use this money to invest in areas where they currently produce. They have thus been able to impose limits on using single payments for investing in farm sectors such as fruits and vegetables. In sum, far from bringing simplification, as its supporters argued it would, the 2003 reform has had the perverse impact of generating intra-EU production quotas.

Matters may be made worse by the recent expansion of the European Union. The 10 new member states have not been able—or keen—to use their accession negotiations as an opportunity to introduce deep CAP reforms. Instead of trying to gain as much of the pre-2003 CAP as possible, they could have fought for amplifying “modulation”—shifting more subsidies from the wealthiest farmers (all of them in the EU15) to all small farmers and to large (but restructuring) farmers in the new member states. The new member states lost an opportunity to build a bridge between EU farmers and farmers from developing countries.

1.2 Driving Forces behind Continued Farm Protection

The forces behind current farm protection are governed by key motives; the instruments used are designed to satisfy these motives. Changes in motives are unlikely to occur in the short run (that is, during the Doha negotiations), but it is nevertheless useful to understand what the motives are, if only because they are often used to justify trade barriers in public opinion.

Looking at both motives and instruments suggests two important lessons. First, negotiators should resist the temptation to liberalize the least protected farm goods under the Doha Round and to leave the most protected products for future rounds. Such an “early harvest” approach would magnify distortions in domestic and world output and trade while keeping intact the main source of the costs of protection. Second, trade negotiators and governments have one robust argument for selling reforms to farmers—a key point since consumers’ and taxpayers’ support to freer trade is not guaranteed. It is that the current instruments of protection are highly inefficient: only 25–30 percent of public transfers to farmers end up as farm income. The rest is dissipated into higher prices of land and other inputs and pure waste of resources.

For obvious reasons, this section focuses on the two “elephants”—the EC and the United States. A better expression would be the two “dinosaurs,” capturing the fact that the countries involved rely on farm policies largely designed in the 1930s (to the extent that the EC farm policy is derived from French farm policy).

1.2.1 *Motives for Support: The Trap of the “Early Harvest” Approach*

Table 1.3 lists the various motives behind current farm protection in four key products (grains, oilseeds, milk, and sugar) in the EC and the United States, as perceived by outside observers (Abare 2001). Motives are defined in terms of the existing situation and of policy direction. The four major motives listed can be ranked by decreasing potential in terms of supporting protection: from a high protectionist potential (maintain current farm lifestyle) to medium-high (preferential access granted to certain trading partners, such as access granted by the EC to the Central European countries) to medium-low (environment) to potentially pro-free trade mercantilism à la GATT (General Agreement on Tariffs and Trade) (expand market access abroad). Grades of 1, 2, and 3 are given to each motive, reflecting its estimated importance, and simple averages are calculated.

Despite its crudeness, table 1.3 suggests several interesting lessons. In grains and oilseeds, the situation in the EC and the United States differs only for the fourth motive (potentially pro-free trade mercantilism), which is stronger in the United States than in the EC. Concerning policy direction, the United States looks more stable than the EC. Europe is perceived as affected by two increasing influences to provide preferential access and to link support to the environment—both easy preys for protectionist forces—and the decreasing desire to expand market access abroad. In milk and sugar, there is no difference between the existing situation and the policy direction in the two countries, except for a rise of environmental concerns in the United States.

Table 1.3 suggests noticeable differences between the two groups of products in terms of potential liberalization. Grains and oilseeds seem “easier” to liberalize than milk and sugar. This observation is important for the design of negotiations. It suggests that there is no such a thing as “agriculture”—some agricultural sectors are potentially (much) easier to liberalize than others. Well known for industrial activities, such an observation is rarely applied to agriculture. In fact, farmers and public opinion tend to conceive agriculture as one activity that will be liberalized (or not) across the board.

Table 1.4 documents this point in more detail by ranking PSE-based nominal protection coefficients for the OECD region by increasing value in order to define the “hard core” of farm protection.¹⁰ This ranking yields two lessons. First, increases in PSE-based nominal protection coefficients during the past 15 years have been largest for certain farm products that were not subjected to a high level of protection in the mid-1980s. In other words, protection (while remaining prohibitive) declined or was stable for some of the most protected products in the mid-1980s, whereas it increased for other farm products that were progressively “contaminated” by highly protectionist trade policies (as illustrated by olive oil or

TABLE 1.3 Support in EC/U.S. Agriculture: Motives and Instruments

	Grains and oilseeds					
	Situation			Policy direction		
	U.S.	EC	Average	U.S.	EC	Average
Motives						
Maintain current farm lifestyle	3	3	3.0	3	3	3.0
Provide preferential access	1	1	1.0	1	2	1.5
Link support to environment	2	2	2.0	2	3	2.5
Expand market access abroad	3	2	2.5	3	2	2.5
Instruments						
<i>Border barriers</i>						
Restrict import access	1	3 ^a	2.0	1	3 ^a	2.0
Export subsidies	1 ^b	3	2.0	1 ^b	2 ^c	1.5
<i>Nonborder price-based instruments</i>						
High internal market prices	1	1	1.0	1	1	1.0
Floor price support	3	3	3.0	3	3	3.0
Domestic support subsidies	3	3	3.0	3	3	3.0
<i>Nonborder quantity-based instruments</i>						
Area reduction programs	1	3	2.0	1	3	2.0
Production quota reductions	1	1	1.0	1	1	1.0
All	1.6	2.4	2.0	1.6	2.3	1.9

fruits and vegetables in the EC). There are thus dynamic forces aiming at narrowing the protection gap between the most and least protected “agricultures.”

Second, the observed gaps of PSE-based nominal protection coefficients among farm products remain substantial enough to define a “hard core” of highly protected farm products that will be particularly difficult to liberalize under the auspices of the Doha Round.¹¹ Taking the PSE-based nominal protection coefficients for all farm products as the borderline between the farm products relatively easy to liberalize and those relatively difficult to liberalize suggests that the “hard-core” protected farm products are milk, sugar, rice, and beef. In all these products, developing countries have comparative advantages, underlying how much OECD protection hurt developing countries. (OECD data do not cover fruits and vegetables and cotton, for which OECD protection can be also very high and in which comparative advantages of developing countries are substantial.)

TABLE 1.3 (Continued)

Milk and sugar					
Situation			Policy direction		
U.S.	EC	Average	U.S.	EC	Average
3	3	3.0	3	3	3.0
3 ^d	3	3.0	3 ^d	3	3.0
1	3	2.0	2	3	2.5
3	2	2.5	3	2	2.5
3	3	3.0	3	3	3.0
3 ^e	3	3.0	3 ^e	3	3.0
3	3	3.0	3	3	3.0
3	1	2.0	3	1	2.0
2	2	2.0	2	2	2.0
		0.0			0.0
1	3	2.0	1	3	2.0
2.5	2.5	2.5	2.5	2.5	2.5

Source: Abare 2000.

Note: Strong emphasis = 3; some preference = 2; weak preference = 1.

a. No EC import restrictions on oilseeds.

b. Export subsidies for wheat discontinued since 1995, but the provisions have not been abrogated.

c. Export subsidies required, but substitution of domestic support subsidies.

d. Strong preferential access for sugar and to a lesser extent for milk in the United States.

e. Milk products only.

The existence of agricultures with very different levels of protection may induce trade negotiators to liberalize the least protected farm products under the Doha Round, leaving the liberalization of the hard core of farm protection for future WTO rounds. Such an “early harvest” approach would be very costly, because it would keep intact the highest trade barriers, which are the main source of the domestic costs of protection. For instance, the costs of protection for European consumers amount to €15 billion in five highly protected farm sectors, compared with €23 billion in 14 highly protected industrial sectors (Messerlin 2001).

TABLE 1.4 Selected Farm Products by Increasing Level of Protection for Farmers, Selected Countries

	Indicators, 2002–04 (provisional estimates for 2004)						
	Japan	EC(15)	U.S.	Canada	Australia	Poland	Mexico
PSE-based NPCs							
Oilseeds	89	0	2	0	0	10	7
Wheat	463	2	1	3	0	24	26
Other grains	342	4	6	3	0	7	14
Maize	—	23	5	8	—	6	26
Poultry	12	68	0	4	0	16	28
Pork	89	27	0	2	0	9	13
All other products	95	22	9	10	0	14	11
Beef	44	138	0	2	0	0	3
All farm products	127	32	9	14	0	15	17
Milk	266	64	60	134	0	23	45
Sugar	167	205	119	—	0	99	64
Rice	491	17	40	—	2	—	34
Percentage production support estimates							
Poultry	11	39	4	5	3	12	21
Pork	47	24	4	9	3	6	12
Oilseeds	57	37	18	15	3	13	48
All other products	51	21	16	24	2	14	17
Maize	—	40	20	15	—	9	35
All farm products	58	35	17	22	4	14	21
Beef	32	73	4	21	4	–3	10
Wheat	85	44	30	17	4	22	28
Other grains	81	51	34	16	3	10	29
Milk	73	41	40	58	15	16	31
Sugar	64	61	57	—	11	52	42
Rice	83	35	33	—	6	—	30

An early harvest would also be a trap for farmers. As it would magnify the differences between the least and most protected products, all farmers would be induced to grow the most protected crops and animals, amplifying the distortions in domestic and world production and trade and making any future adjustment even more costly.

By contrast, trade negotiations aiming at favoring as much as possible a uniform farm tariff policy (the same tariffs on all farm products) would allow a welfare-enhancing reallocation of farm resources. It would begin to reveal the

TABLE 1.4 (Continued)

OECD average	OECD variance	Indicators (2002–04)/(1986–88)		
		EC(15)	U.S.	OECD
4	0.3	0.0	200.0	14.8
8	39.1	1.8	3.0	11.6
9	23.5	2.8	17.1	9.3
10	0.1	19.2	38.5	33.3
20	0.5	86.1	0.0	60.6
22	1.1	71.1	0.0	73.3
25	1.3	51.2	75.0	62.5
27	3.1	111.3	0.0	65.9
29	2.4	40.0	64.3	50.9
78	11.7	17.7	100.0	42.4
127	2.1	88.4	90.8	95.5
304	62.3	10.6	88.9	77.7
18	0.2	31.5	30.8	90.0
21	0.3	150.0	100.0	116.7
23	0.2	62.7	225.0	88.5
25	0.2	72.4	100.0	86.2
25	0.2	75.5	52.6	62.5
30	0.3	85.4	77.3	81.1
35	0.7	132.7	66.7	109.4
35	0.7	86.3	61.2	74.5
42	0.7	91.1	85.0	82.4
46	0.5	58.6	97.6	75.4
55	0.3	101.7	98.3	101.9
76	0.9	58.3	63.5	93.8

Source: OECD 2005.

Note: NPCs = nominal protection coefficients. Percentage PSE is the ratio (PSE/value of total production at farmgate prices);

— = not available.

comparative advantages of each OECD country in farm production, and it would do the same for developing countries. The trade-off that trade negotiators will achieve between a uniform protection policy (economically the best) and an “early harvest” approach (politically the easiest) will be the most critical issue of the Doha Round. It has already surfaced in the differences between the proposals

TABLE 1.5 Evolution of the Breakdown of Total Support in Agriculture, Selected Countries and Years

	Total support estimate in million US\$		
	1986–88	2000–02	2002–04
Protectionists			
Korea, Rep. of	13,217	20,887	21,247
Japan	57,644	60,168	58,881
Norway	3,162	2,570	3,146
European Community	110,771	103,849	128,881
Hungary	901	1,443	1,876
Poland	1,693	2,343	2,414
Czech Republic	1,386	940	1,117
Switzerland	6,546	5,144	5,834
Middle of the road			
United States	64,009	93,504	96,972
Canada	7,577	5,604	7,160
Turkey	3,471	7,878	10,485
Mexico	1,510	8,673	7,848
Free traders			
Australia	1,710	1,387	1,504
New Zealand	578	161	304
OECD	305,510	315,045	345,830

for liberalization tabled by the United States (leaning toward a uniform policy approach) and suggested by the EC (leaning toward an early harvest approach), as discussed below. This issue will be exacerbated by the food safety dimension, which is much more difficult for certain farm products (meat) than for others (sugar).

1.2.2 The Low “Transfer Efficiency” of Current Instruments of Protection

The major instruments for protection were grouped in three categories (border instruments, nonborder price-based instruments, and nonborder quantity-based instruments), and grades of 1 (low) to 3 (high) were given to each instrument to reflect its importance. Table 1.3 shows the wide difference between the EC and the United States in grains and oilseeds but the close similarity in milk and sugar

TABLE 1.5 (Continued)

Breakdown of total support estimate								
PSE share (in %)			GSSE share (in %)			CSE share (in %)		
1986–88	2000–02	2002–04	1986–88	2000–02	2002–04	1986–88	2000–02	2002–04
91.4	86.6	85.9	8.1	13.0	13.4	0.6	0.4	0.7
85.0	79.5	79.7	15.2	20.4	20.2	–0.2	0.1	0.1
88.9	91.3	92.2	4.1	6.0	7.2	7.0	2.7	0.5
91.8	88.9	88.7	9.7	7.7	8.2	–1.4	3.4	3.2
97.7	83.2	83.8	0.6	14.3	16.2	1.8	2.5	0.0
84.6	89.1	85.5	15.2	9.5	12.9	0.2	1.4	1.5
97.4	89.4	89.8	2.6	10.5	10.0	0.0	0.1	0.2
83.4	90.8	91.6	6.7	6.3	6.5	9.9	2.8	2.0
56.9	50.2	41.7	25.2	26.0	31.6	17.9	23.8	26.7
80.3	75.9	77.1	19.3	24.1	22.6	0.4	0.0	0.3
91.1	63.9	89.3	8.9	36.1	10.7	0.0	0.0	0.0
–7.2	88.2	89.5	45.0	7.9	9.8	62.1	3.9	0.7
77.3	66.3	71.0	22.7	40.6	38.1	0.0	–6.8	–9.1
82.0	41.0	61.2	18.0	58.4	38.8	0.0	0.6	0.0
79.5	74.5	73.5	13.4	17.1	17.7	7.1	8.4	8.8

Sources: OECD 2003, 2005.

Note: GSSE: General services support estimates.

(the 2002 Farm Bill reinforced similarities and narrowed dissimilarities, as shown below). It also suggests that deep changes in the pattern of instruments used are unlikely in the coming decade, except in export subsidies.

Tables 1.5 and 1.6 try to go further. Table 1.5 breaks down total support into its components: producer support, support granted to agriculture in general, and consumer support (which is marginal, except in Mexico and the United States). It shows few changes in these three sources of support since the Uruguay Round, except in pro-free trade OECD countries and Canada. In all the protectionist countries, the producer support share in total support in agriculture is greater than 80 percent and stable. The evolution is less clear for the rest of the OECD

TABLE 1.6 Evolution of the PSE Breakdown by Type of Subsidies and of Global Efficiency Transfer, Selected Countries and Years

	Breakdown of the producer support estimates (PSE)(%)								
	Market price support			Area payments ^a			Payments based on output		
	86-88	00-02	02-04	86-88	00-02	02-04	86-88	00-02	02-04
Protectionists									
Korea, Rep. of	99	94	93	0	1	2	0	0	0
Japan	90	90	90	0	0	0	3	3	3
Norway	49	42	47	9	16	23	24	14	9
European Comm.	87	57	55	3	28	29	5	4	4
Hungary	75	57	47	4	9	11	0	6	8
Poland	66	74	72	0	2	2	0	5	5
Czech Republic	93	64	64	1	21	23	0	1	1
Switzerland	83	59	56	6	29	33	1	5	5
Middle of the road									
United States	39	35	35	31	24	12	8	16	10
Canada	52	47	48	16	25	24	16	5	4
Turkey	70	76	77	0	12	18	0	6	3
Mexico	83	68	57	—	18	21	—	3	4
Free traders									
Australia	50	3	1	0	11	13	0	3	0
New Zealand	19	69	82	37	0	0	0	0	0
OECD	78	63	61	7	18	21	5	6	4

countries, with Mexico and the United States at the two ends of the spectrum. Support granted to agriculture in general gives some indications of the real danger of “nontrade concerns” being used as substitutes for straight protection in the protectionist countries. Its stability in the protectionist and middle-of-the-road countries may be a good omen in this respect, though its evolution in the Czech Republic, Hungary, and Turkey is an additional source of worries for these “new” protectionist countries.

Table 1.6 goes one step farther by decomposing producer support into the four major instruments concretely used to transfer public support to farmers. It shows that only Australia and Canada have taken seriously the Uruguay Round spirit of “decoupling” support from production, with a noticeable use of payments to

TABLE 1.6 (Continued)

Breakdown of the producer support estimates (PSE)(%)									Share farm income in total income
Input subsidies ^b			Payments based on overall farm income			Global transfer efficiency ^c			
86-88	00-02	02-04	86-88	00-02	02-04	86-88	98-00	00-02	[d]
1	3	3	0	2	2	25	25	26	47
7	7	6	0	0	0	24	24	24	13
19	25	18	0	2	3	25	26	28	49
6	12	13	0	0	0	25	30	30	57
21	28	34	0	0	0	29	26	25	44
33	18	21	0	0	0	17	23	23	72
7	14	13	0	1	0	25	28	29	—
8	6	7	0	0	0	25	30	30	73
18	19	32	2	5	5	31	32	31	4
14	8	5	0	14	17	27	40	39	14
30	6	2	0	0	0	21	23	25	77
16	10	18	0	1	0	—	30	30	—
30	67	76	20	16	10	38	32	33	59
39	30	17	5	1	1	34	24	23	—
9	12	13	1	2	1	26	28	28	—

Sources: OECD 2002, 2005.

Note: — = not available.

a. Sum of payments based on area planted/animal numbers and on historical entitlements.

b. Sum of payments based on input use and on input constraints.

c. Cents received by farmer from one dollar of PSE (weighted sum of PSE components, where the weights are the OECD-wide transfer efficiency indicators [OECD 2002] which are assumed constant over time) (see text).

d. Latest year available (varies from 1995 to 2002).

farmers directly based on overall farm income. Market price support remains, by far, the dominant instrument used by protectionist OECD countries, with some exceptions, such as in the EC, where subsidies on acreage and headage represent one-fourth of producer supporter.

All these observations lead to an important argument that negotiators and governments could use to convince farmers of the necessity of reforms—a crucial point since consumers' and taxpayers' support to freer trade is not guaranteed.

The argument is that ultimately farmers get only a small portion of all the money poured into agriculture—the “transfer efficiency” of public support to agriculture is low. A large share of these transfers ends up in unintended pockets—those of landowners and suppliers of other farm inputs—and in pure waste.

Recent estimates of transfer efficiency for each of the producer support components listed in table 1.6 show substantial variations across the four components (OECD 2002, 2005). Area payments are the least inefficient kind of transfer, because they translate into net farm income of one-half of their amount if—a big if—one ignores the long-term impact on land prices and rents. Other instruments have a much lower transfer efficiency, from one-fourth for market price support and payments based on output to one-fifth for input subsidies. Table 1.6 applies these estimates to the main components of producer support. It leads to the conclusion that only 25–30 percent of producer support ends up in farm incomes.

That only \$0.25–\$0.30 of every dollar of support goes to farm income is a powerful argument in the context of the Doha negotiations. Underlining the inefficiency of the existing transfer regimes from the farmers’ point of view seems to fit much better the current political economy of protection in most OECD countries, which may be characterized by a lack of will by consumers to oppose farm policies, by wide public support of domestic farmers as producers of environmentally and healthy food, and by an increasing divide between large and small farmers (with small farmers more interested in an improved transfer efficiency, see section 1.3).

1.2.3 Implications of Recent Moves by the “Two Dinosaurs”

The two dinosaurs took several important domestic and trade initiatives during 2001–03. A key question is whether the United States is still more supportive of freer trade than the EC, as it has traditionally been. What follows argues that the EC remains the most worrisome source of difficulties for farm liberalization in the coming years, despite the shift in the U.S. position.

The first reason suggesting the EC is still the key obstacle to farm liberalization is the almost complete lack of farm export lobbies. Relatively efficient British or French farmers do not seem to realize that the current CAP favors inefficient farmers to the detriment of all efficient farmers, whether outside or inside the EC. In other words, they do not seem to realize that the substantial but limited decrease of EC protection that the Doha Round could deliver would provide benefits to them as well as to efficient farmers from the rest of the world. In contrast, export lobbies exist in the United States, and they provided the necessary support to the initial pro-liberalization proposals by the United States in the Doha Round.

U.S. export farm lobbies had a relatively passive attitude vis-à-vis the 2002 Farm Bill. How can their passivity be reconciled with their traditional support for WTO-based liberalization? A first reason is institutional. Traditionally, the U.S. House of Representatives has strong leadership over farm bills. The differences between the House and the Senate (which reflect differential interests in small versus large farms, the South and West versus the Midwest) provide many opportunities for small but well-organized, vested farm interests. By contrast, the president can take initiatives on trade issues (conditional on final approval by the U.S. Congress). Another key reason for the U.S. export farm lobbies' passivity may be that the 2002 Farm Bill does not change significantly the magnitude of U.S. support to farmers for the crops already subsidized by the 1996 Farm Bill (everything else constant). In fact, in the short run the new bill mostly transforms the subsidies granted *ex post* under the previous 1996 Farm Bill into *ex ante* subsidies.¹² In the medium run the bill does more, largely because it increases the coverage of the farm products benefiting from support.

In the long run, the potentially depressing impact of the 2002 Farm Bill on world farm prices will depend, among other factors, on the bill's capacity to reduce the United States' ability to quickly revert to a less protectionist farm trade policy (if the Doha Round makes progress) and on its contagion effect on other WTO members. How great these effects are depends largely on timing.

Take first the U.S. ability to revert to a more open farm policy. Commitments on dismantling farm trade barriers on which the United States could agree by 2003–05 under the Doha Round would be implemented in 2006–08 at the earliest—that is, under the auspices of the 2008 Farm Bill (the 2002 bill will last six years, although financial appropriations are established on a 10-year basis). In other words, the 2002 Farm Bill does not directly constrain U.S. negotiating freedom. It will make delays in the Doha Round negotiations on agriculture very costly, however, because such delays may strongly induce perpetuation of the 2002 Farm Bill, worsening substantially its long-run impact.

Second, the assertion that the 2002 Farm Bill could have only a negative impact on the farm policies of other WTO members—particularly the EC—is debatable. First, the current situation does not differ much from the one prevailing in 1992–94, when the United States was able to play the role of a pivotal deal maker between protectionists and free traders, at a time when its farm policy was as protectionist as it is under the 2002 Farm Bill. Of course, the 2002 bill weakens Europeans who counted on the U.S. lead for liberalization. But one could also argue that the bill may help European supporters of the CAP reform by showing that such a reform is not done to please the United States but for the sake of European welfare. Of course, the current CAP reforms are very modest, so the unchanged ceiling on EC total support to agriculture implies that the support

per farmer will continue to increase in Europe (by an additional 10 percent in 2006 with respect to 2001, everything else constant). This modesty may have been adopted with the hope of minimizing initial conflicts with some member states. In this case, it is a failure: it did not inhibit France from rejecting the proposal—a stand that was at odds with its agricultural interests, as the envisaged reform would have been very beneficial for most French farmers. But this modesty may have another cause. Most of the topics on which the Commission's proposals are modest will be negotiated in the Doha Round—the modesty of the Commission's proposals may thus simply reflect the absence of European export farm lobbies.

There are other signs of the heavy burden that the absence of European export farm lobbies imposes on EC farm policy. For example, the EC proposals in the Doha Round favor only modestly higher cuts for the highest barriers, with the possibility of many exemptions, so that the huge gap between the least and most protected farm products will not be seriously reduced (and could even be increased). Such an approach would be very costly to European consumers, and it would hurt EC farmers as well, because it would inhibit them from reallocating their resources toward products in which they have comparative advantages.¹³

1.2.4 The Impact of EC Enlargement

Another source of uncertainty for the evolution of the CAP is the impact of the accession of Central European countries to the EC (in what follows, EC refers to the original members of the European Union). In sharp contrast to the situation in the EC, agriculture is still a relatively large domestic sector (in terms of value-added and jobs) in most Central European countries, even for countries with no substantial comparative advantages in this sector (only Bulgaria, Poland, Romania, and Turkey are seen as potentially large producers of a wide range of farm products in the future) and despite the fact that during the 1990s, farm outputs declined significantly in most Central European countries, which began to import farm products from Argentina, Australia, and Brazil. In 1996 gross agricultural product in the Central European countries and the Balkans amounted to 7 percent of GDP (compared with 1.7 percent for the EC), whereas farm jobs represented 22.5 percent of total employment in the Central European countries and the Balkans (compared with less than 5 percent in the EC).

There is only a limited match between the main beneficiaries of existing protection in the EC and Central European countries. This important observation suggests limited opportunities for coalitions uniting farmers from the “Western” (EC) and “Eastern” (Central European) parts of the enlarged EC. Not only do the Central European countries lack export farm lobbies, the farmers in these countries will be seeking protection at a time when EC farmers are beginning to lose their political clout.

Enlargement may further delay farm liberalization because, in the absence of additional, serious CAP reform, farm trade issues between the EC and Central European countries may become hard to manage. (Until 2000 farm products were largely excluded from the bilateral Europe agreements between the EC and the Central European countries.) On the one hand, the EC is clearly not ready to extend the existing CAP to Central Europe, simply because it cannot afford the budgetary consequences of such an extension. On the other hand, the Central European countries seem irresistibly attracted to mimic the CAP, as best shown by the above-mentioned increases in the PSE- and CSE-based nominal protection coefficients in Central Europe. This strategy is a trap for farmers in Central Europe, because by closing their farm markets to foreign competition (only a decade after the collapse of central planning), it will reduce the much-needed incentives for farmers to become more competitive, leading to increasingly uncompetitive situations (in 1999–2000, for example, pork was more costly to produce in Poland than in France).

Unfortunately, the logic of the Doha Round—the deeper the CAP reform, the lower the compensation to be paid by the enlarged EC to the countries of Central Europe—will not impose a strong push on the enlarged EC. This is because the small volume of trade with Central Europe makes compensation likely to be a small burden for the enlarged EC. In sum, the enlarged EC trade policy in agriculture will continue to be driven by the situation prevailing in the EC, where the rapidly diminishing power of the farm lobbies is being strengthened by a coming crowd of Central European farmers. The only way for the enlarged EC to get out of this dead end is to adopt a “two-track” CAP in which provisions will be different for large and small farms (see section 1.3).

1.3 The Political Economy of Protection

This section examines coalition-building issues that may be critical for moving agricultural policy reforms forward. It tries to identify possible pro-free trade coalitions for farm trade policies. It first looks at traditional actors (consumers and producers) in trade matters, before turning to less customary actors (finance ministers and nongovernmental organizations).

1.3.1 Which Consumers?

Targeting individual final consumers (or their associations) as a key component of pro-free trade coalition building is the natural thing to do when aiming at reducing protection. It does not seem a promising approach in the farm case, however. This skepticism is best illustrated by a recent poll (Eurobarometer 2000), which delivers a stark message (all the starker because the poll was conducted at a time

when farm issues were at the forefront of European news). Half of the Europeans polled had never heard of the Common Agricultural Policy, and only 19 percent of them were relatively aware of what it was (the rest of the respondents were vaguely aware that it was some kind of European farm policy). Changing this situation would require an amount of money, time, and energy that is unlikely to be available in the few years to come.

Focusing on individual final consumers is riskier for other reasons, too. First, as is well known, farm protection hurts poor consumers more than rich ones, because the food share in income is much higher for the poor.¹⁴ (In contrast, people concerned about the environment tend to be richer than average.) But poor people are not politically powerful, and they tend to feel closer to farmers, a substantial share of whom are also relatively low-income earners.

Second, another Eurobarometer poll (2001) suggests that the links between farm policy and food safety are much stronger in public opinion than those between farm policy and food prices. Europeans strongly support farm policies to the extent that they protect small domestic farmers, who are perceived as guaranteeing food safety. These opinions may be changing. Consumers are increasingly aware that, although domestic farmers flaunt themselves as protectors of the environment and food safety, they are heavy polluters and relatively careless about the health of their compatriots, as demonstrated by the mad cow and foot-and-mouth episodes. But recognizing that the environment and food safety have little to do with the nationality of the farmers will take a lot of time—time that Doha negotiators do not have.

Industrial consumers—the agribusiness industries—seem a much more useful target for supporting freer trade in the few years left for negotiations. The Doha Round should normally lead to a decline in the remaining industrial tariffs, which are now concentrated in a few industries, including agribusiness industries. Decreasing tariffs protecting the output of agribusinesses should put considerable pressures on these firms to get their sources of raw materials (farm products) liberalized as well. Such pressures were visible in 1995–96, when it was still believed that the URAA would deliver some kind of farm liberalization in the late 1990s. At that time, agribusiness firms made clear that any further liberalization of their outputs should be accompanied by a liberalization of farm inputs.

Will agribusiness firms maintain this stance during the Doha Round? It is likely. The agribusiness sector was one of the strongest supporters of the July 2002 Commission's proposals on the Mid-Term Review (Haskins 2002). But their continued support is not certain. The many international mergers observed in the agribusiness sector during the 1990s may have partly isolated these firms from the risks of increasing negative effective rates of protection generated by a Doha liberalization in industrial goods unaccompanied by a liberalization in farm products.

1.3.2 Which Farmers?

The crucial point in terms of coalition building involving farmers is the huge heterogeneity of the farmer population in industrial countries. Highlighting key aspects of this heterogeneity should help fight the monolithic view of agriculture that largely prevails in public opinion and the efforts of the farm lobbies to hide this heterogeneity as much as possible. In fact, if there is any success with which to credit the Uruguay Round, it is that it revealed the differences between large and small farmers—probably the crucial heterogeneity for the years to come. Three major sources of heterogeneity could play an important role in the Doha negotiations.

Demographics. Farmers represent a tiny portion of the total labor force in most industrial OECD countries (less than 3 percent in the three most important EC member states). Moreover, this population is rapidly aging, with a large proportion of farmers older than 55 years (in Normandy, the third-best endowed farm region of France, half of all farms have no heirs willing to run them).

These trends are well known, but they should be better publicized. In particular, the public should be made to realize that keeping agriculture support constant as the number of farmers declines represents an increase in support to the remaining farmers. These facts should be complemented by information on farmers' share in rural areas, because the relations between farmers and rural areas largely determine farmers' political influence in developed countries. For instance, most European politicians are convinced that rural areas still depend heavily on agriculture. But the share of farmers in rural areas is declining. In France, for example, farmers represented only 17 percent of the French rural population in 1999.¹⁵

A related issue is the share of income from nonfarm activities in the total income of farm households. Nonfarm activities are an important source of income in farm households in many OECD countries (table 1.6), but there is little information on the extent to which these nonfarm activities are related farm activities—that is, the extent to which they are complements of, or substitutes for, farming.

All these developments suggest that farmers' political influence is declining. Farmers are regularly losing seats in the French Senate—the fortress of the French rural population in the French constitutional framework.¹⁶ The campaigns for the 2002 German elections revealed a policy shift in Bavaria, one of the traditional bastions of German agriculture, with the Bavarian minister-president openly criticizing the EC CAP and praising high-tech industries. These themes were particularly prominent during the United Kingdom's 2005 EU presidency, when Britain argued that it made no sense to devote more than 40 percent of the EU budget to agriculture. (This issue contributed to the failure to agree on the EU budget at the European Council meeting in June 2005.) The OECD country where farmers' political

TABLE 1.7 Concentration of Support on Large Farms in the U.S. and in the EC

Farm size	Gross margin ('000 euros)	No. of farms (share: %)	Support (share: %)	Percent of EC average wage ^a
European Communities, 1996				
Very small farms	<5	20	3	20
Small farms	5–10	19	5	30
Medium small farms	10–19	21	14	48
Medium large farms	19–160	23	28	70
Large farms	160–400	13	29	110
Very large farms	>400	4	21	210

influence may be the most stable is the United States, where farm states are overrepresented in the U.S. Senate due to the federal structure of the country (see below).

Small versus large farmers. A second major source of heterogeneity—probably the most important one in the few years to come—is the distinction between small and large farmers. Farm trade policies of most OECD countries are strongly biased against small farmers and in favor of large farmers. Table 1.7 summarizes these differences in public support, farmers' revenues, and wealth in the EC and the United States. Current farm policies have begun to take into account this aspect by "capping" public support. The 1999 Berlin Council introduced a "modulation" scheme, and the 2002 U.S. Farm Bill as well as the recent EC proposals for the Mid-Term Review include some caps on the level of subsidies that can be granted to very large farms.

All this suggests a more systematic examination of experiences and the potential virtues of a "two-track" farm policy that would fully subject large farmers to liberalization (subsidy reductions and tariff decreases, possibly accompanied by a safety net depending on the magnitude of the liberalization) but would keep unchanged existing protection for small farmers (by granting them direct income support).

The small farmer–large farmer distinction should not raise problems in the WTO forum, because small farmers tend to produce locally oriented products or sophisticated goods that are not subject to high protection rates (by the usual standard of farm protection). In other words, they represent only a marginal source of trade distortions. This feature suggests that keeping subsidies to small farmers as they are—or even increasing them conditionally by adopting a pure income support scheme—should not be a source of big worries or difficulties.

TABLE 1.7 (Continued)

Farm size	Sales ('000 \$)	No. of farms (share: %)	Support (share: %)	Percent of U.S. average income ^b
United States, 1997				
Small farms	<100	81	34	19
Medium farms	100–250	10	25	—
Large farms	250–500	5	21	206
Very large farms	>500	4	20	403

Sources: Abare 2000; Blanford 2001.

Note: a. Ratio (EC farm earning per person/EC average wage).

b. Ratio (U.S. farm income per household/U.S. average household income).

In Europe a two-track farm policy based on the “small farmer–large farmer” distinction is appealing for several reasons. First, it meets less hostility from small European farmers, who now look upon pure income-based supports more favorably than they once did. Second, a two-track policy is compatible with the existence of integrated European farm markets within the current EC (that is not the case of renationalized CAP subsidies that will inevitably create intra- as well as extra-EC barriers). Third, a two-track policy is the only policy that can address the challenge of managing the accession of the new member states in a way that is both fair and economically sound. It gives a unique—hence fair—definition of the income support to be granted to all small farmers in Europe. This could be the same percentage of average income or wages of the member state in question. In the enlarged EC, this unique definition would lead to different levels of farm support (in currency units) in different EC member states, thereby reducing the costs of the system on a fair and objective basis. Even more important, in the long run this definition will retain incentives for small farmers in the Central European countries to modernize their farms. By contrast, EC wide subsidies would tend to be too high, eliminating such incentives and accelerating the rural exodus of small farmers in Central Europe, to the great benefit of “Western” farmers who will buy their land.

Of course, the two-track farm trade policy approach has an intrinsic weakness: large farmers will have strong incentives to find ways to circumvent this approach—by dividing their farms into smaller (probably less efficient) units, by obtaining partial exemptions for spouses (as already observed in the first attempts to introduce such a policy in the United States), and by other means. The deeper

liberalization will be, the stronger these incentives will be.¹⁷ Research should carefully investigate the pros and cons of distinguishing between small and large farmers, particularly by identifying the instruments that are least sensitive to size and by taking into account impacts on the various OECD member states.

Member-states and other subnational entities. In federal countries (such as the United States) and a common market (such as the European Union), farm policies are defined at the central level—the U.S. Congress in the United States, the EC Council of Agriculture Ministers and the European Council of the Heads of State in the EC. Farmers from some states are better able to drive federal policies than farmers from others. It is estimated that the 2002 U.S. Farm Bill will disproportionately benefit Illinois, Iowa, Minnesota, Nebraska, and Texas. Within the EC, France is usually cited as the strongest opponent of CAP reforms. But, in fact, the U.K., Sweden, and Ireland have been, on average, much better at getting the benefits from the CAP protection than France has (Messerlin 2005).

In this context, it is critical to assess the impact of liberalization not only on the “federal” entity but on its individual member states. For instance, a largely ignored impact of the CAP is that EC subsidies tend to protect farmers from less efficient member states. Opening the EC to foreign competition by decreasing EC subsidies would have the effect of opening the least efficient member states to the most efficient member states as well as to the rest of the world (if reduced EC trade barriers still remain substantial, this evolution could maintain substantial trade diversion). Better knowledge of the different production costs in the provinces or states of the two dinosaurs could reveal wider farm export interests than those perceived today, possibly allowing a change in the balance between protectionists and free traders within each dinosaur. Similarly, a different concentration of large farmers in the various member states should be taken into account when designing a two-track policy.

1.3.3 Which Other Actors?

In Europe a very special actor has been involved in farm policies during the past 30 years: the finance ministers of the member states. So far their role has been rather ambiguous: important for capping the overall amount of subsidies but nonexistent for promoting structural reforms. Capping is now widely accepted. But it is ineffective to the extent that the number of farmers is decreasing, so that increased subsidies per farmer do not induce the remaining farmers to cut costs or to raise only those farm products in which they have a comparative advantage. As a result, the role of the finance ministers may be even more marginal in the future.

Their role can even become negative if they support “renationalizing” farm subsidies. Leaving each member state responsible for determining farm subsidies

may reduce the amount of subsidies at the European level, but it is likely to create 15 (more than 25 in the future) CAPs in Europe. For instance, Germany will not be willing to pay French farmers, but it will be eager to subsidize its own farmers at least as much as before, by preventing more efficient non-German farmers from entering German markets. Meanwhile, France will be likely to compensate for missing German funds through national programs.

The only way to make EC finance ministers more involved in the structural changes of EC farm policy (and not only in a mere cost-containment approach) would be to focus on the low transfer efficiency of the current farm support regimes. Finance ministers would then be induced to develop pure income-support programs.

During the past decade, another group of actors has emerged in the debates on farm policies: nongovernmental organizations (NGOs). There are two main kinds of NGOs. The first are NGOs with a well-defined objective (environmental sustainability, food safety, animal welfare). While raising key issues, these NGOs tend to be easily captured by OECD farmers, at great risks to their credibility. The main issue at stake is thus strengthening the independence of these NGOs, as briefly illustrated with environmental and food safety NGOs.

During the past decade, several environmental groups have been instrumental in underlining the wasteful and environmentally harmful effects of farm policies. In this respect, they are natural allies of economically sounder farm policies. But many environmental groups have also a strong pro-interventionist bias, for a wide range of reasons, including doubts about the ability of science to solve emerging problems, their desire to impose their own views without compromise, and their will to act rapidly. They tend to doubt that market-based tools can find the right balance between farm production and environment, and to ignore the wide range of possibilities offered by combining market incentives and social regulations. They end up hostile to freer trade, which makes them an easy prey for OECD farmer lobbies—hence the unholy alliances between “greens” and farmers that have been observed all over Europe.

Food safety groups are similar to environmental groups, with two differences. First, in recent years they have been more easily captured by farmers’ lobbies than environmental groups (in fact, many European food safety groups are run by farmers), as best illustrated by the panic about unsafe food being presented as a synonym for foreign food. Recent food crises (mad cow, foot-and-mouth disease) have shown that domestic farmers are not more careful about health safety than foreign farmers, undermining the general credibility of food safety groups. Second, food safety raises more difficult issues than the environment, both from an economic point of view (what is the effective validity of the principle of scientific evidence and of the precautionary principle?) and from a legal perspective (how

should the subtle relationships between technical standards, rules of origin, and labeling be managed?).

The second kind of NGOs are those interested in “development.” These groups have a much broader portfolio of interests. The wide scope of issues they address makes it much harder for farmers’ lobbies from the OECD countries to capture these groups. But they are less immune to farmers’ lobbies from the developing countries, as illustrated by their support for the introduction of a “Development Box” in the Doha Round, which would exempt developing countries from WTO rules in order to “protect the poorest farmers in developing countries.”

It is beyond the scope of this chapter to examine the Development Box proposal in detail. What follows presents only three comments. First, there is no need for such a box if the Doha Round focuses on the peak barriers in agriculture, as it should. In such a case, protectionist OECD countries would reduce their own barriers by (much) more than developing countries would reduce theirs. This observation assumes that developing country farm support (tariffs, other border barriers, and subsidies granted to and taxes imposed on farmers, which are often important in developing countries) is (much) lower than OECD farm support—an assumption that seems plausible for many developing countries. In such a scenario, the overproduction created by the current OECD farm trade policies will be reduced, and markets will induce developing country farmers to produce more.

Second, most development-oriented NGOs are unlikely to be satisfied by this first argument, because they see the Development Box as an instrument in favor of the poorest farmers. But a key lesson to be drawn from the history of all OECD farm policies is that they have been introduced with the same focus on poorest farmers, only to turn, progressively but inexorably, into a subsidy machine for large farmers, a machine of exclusion for small farmers,¹⁸ and a machine for increasing food prices to the detriment of the poorest of the poor—that is, poor consumers who lack even a piece of land to cultivate. Farmers’ poverty would be much better addressed by appropriate income transfer policies, by the reallocation of the least efficient poor farmers to other activities, or both—a growth path that the Development Box would artificially inhibit.¹⁹ Using trade policies that can be easily captured by the most powerful domestic vested interests (which almost surely include the richest farmers and exclude the poorest farmers) is an almost certain recipe for failing to eradicate poverty.

The Development Box may echo a last argument, generally only indirectly mentioned by the NGOs. It is the rapidity of the changes that could be brought about by trade liberalization in agriculture. In fact, there may be reasons for such concerns. But in this case, this problem should be addressed in the most direct manner possible—by fine-tuning the pace of liberalization under the Doha Round.

1.4 Concluding Remarks

This brief survey of the domestic political economy associated with WTO agricultural negotiations shows that the major task still lies ahead for OECD countries. Australia and New Zealand excepted, it is the OECD members that are the major culprits in maintaining the high levels of agricultural support that distort global markets. The task is particularly daunting for the EC and the United States, which remain prisoners of antiquated farm policies that date from the 1930s, when their farm sectors were dominated by small family farms.

Moving forward will require the formation of coalitions. Support for reforms from individual final consumers and taxpayers is far from guaranteed. Consumers are not likely to support reform, because they are spending less and less on food (and hence have little incentive to oppose costly protection). Taxpayers are not likely to back reform, because they support, more or less willingly, nontrade concerns, such as environment or food safety, which they (erroneously) associate with domestic farmers and farm support. Recent developments, such as food crises that revealed that domestic farmers are rather careless about the health of their compatriots or the massive pollution generated by domestic farm production, may induce individual consumers and taxpayers to become more supportive of freer trade. But such a change in attitude is likely to take too long to have an impact on the Doha Round negotiators, who confront a deadline of 2006–07 to complete the round (given the expiration of U.S. trade promotion authority in 2007, the renewal of the U.S. Farm Bill in 2008, and EC enlargement).

Trade negotiators should look toward other allies. A natural candidate is a powerful group of consumers—the agribusiness industries, for which a reduction of the still high protection of their products under the Doha Round requires a corresponding reduction of protection in their farm inputs. Trade negotiators should also talk to farmers. They should distinguish between small and large farmers, arguing that small farmers contribute little to the existing chaos in world farm production and trade and could hence continue to benefit from public support (in the form of pure income support schemes, which are likely to be much more efficient in terms of income transfer capacity than the current instruments of protection) without any serious damage to the world trading system. Farm liberalization will thus essentially concern the vested interests of large farmers, who, in terms of power, size, and income, are not different from manufacturers and therefore do not deserve treatment that is different from that imposed on manufacturing over the past 50 years of liberalization.

Doha negotiators should focus, as much as possible, on the peaks of protection in order to make as uniform as possible the level of protection faced by different “agricultures.” This objective will ensure that farmers will be induced to invest in the right crops or animals—that is, those in which they have comparative

advantage, not those for which they enjoy the highest protection. Any attempt to reap an early harvest by liberalizing the least protected farm products (and pressures on trade negotiators to do so will be enormous, because an early harvest will be politically much easier than a uniform policy) will make future farm liberalization extremely difficult, because it will push all farmers into the same highly protected sectors, with huge costs of adjustment in case of further liberalization. From this perspective (and taking into account fears of adjustment capacity in developing countries), it would be much better to envisage longer deadlines for implementing a higher level of uniform protection than to adopt shorter deadlines for more limited commitments in the most protected agricultural activities.

A precondition for such a coalition-building exercise is information. Surprisingly, the type of data needed is rarely available. Statistics on total, producer, and consumer support to farmers in developing countries are very limited. The type of detailed information on the inefficiency of the existing instruments of protection (for example, the total cost associated with a specific transfer program); on the distribution (incidence) of support (for example, the share that goes to large farmers in key countries); on the environmental impacts of agricultural support policies; and on other crucial variables is often missing, of low quality, or too aggregated to be useful politically.

Notes

1. These figures are much higher than in middle-income developing countries, where agriculture accounts for 12 percent of GDP, 15 percent of exports, and 15–40 percent of total employment.

2. Agricultural trade policy and trade negotiations have been the subject of much research. See Fitchett (1987) for a brief survey of the issues and the literature; Hathaway and Ingco (1996) for an early assessment of the Uruguay Round Agreement.

3. “Total support” gives a measure of the annual monetary value of all gross transfers from taxpayers and consumers arising from policy measures that support agriculture, net of the associated budgetary receipts, regardless of their objectives and impact on farm production and outcome. It is the broadest indicator of farm support calculated by the OECD Secretariat. As a result, it includes expenses related to certain nontrade concerns (research and development, food safety and quality).

4. Producer support measures all gross transfers from consumers and taxpayers to support domestic farmers, measured at the farm-gate level. Consumer support measures all gross transfers from (to) domestic consumers of farm products, measured at the first consumer level. Total support is the sum of producer support, general services support, and transfers from taxpayers to consumers (one of the four components of consumer support).

5. There are two tariff estimates, because PSEs and CSEs do not take into account the same domestic prices. PSE-based nominal assistance coefficients measure the ratio between the value of gross farm receipts, including support and gross farm receipts valued at world market prices without support, whereas CSE-based nominal assistance coefficients measure the ratio between the value of consumption expenditure on farm products domestically produced, including support to producers, and that valued at world market prices, without support to consumers.

6. To take account of the fact that many people in the farm business work part time, the number of farmers is expressed in full-time farmer equivalents. Producer supports per farmer should not be compared across countries, because they reflect countries’ farm pattern (size, geography, and so forth) and

the pattern of the farm goods produced (however, OECD countries are characterized by a relatively stable product composition over the examined period).

7. Interestingly, some farm leaders provide a more accurate picture of reality. A study by the *Chambre Régionale d'Agriculture de Normandie* (2001) clearly shows that until late 2000 the Uruguay Round had no impact on farmers in Normandy.

8. These arcane calculations reflect differences between the bases for paying the three supports, which are crucial in the WTO context. Loan deficiency payments are paid on the basis of production during the period in question. As they are clearly not decoupled subsidies, they pertain to the WTO Amber Box of the trade-distorting subsidies. Direct payments are paid on the basis of historical production, that is, production that occurred during the reference period defined by the FSRIA. They are considered to be decoupled subsidies—hence they pertain to the WTO Green Box (permitted subsidies). By contrast, the legal status of the countercyclical payments was initially ambiguous. To the extent that they are paid on the basis of historical production, they are decoupled from current production. But as they rely on target prices, they contain a link between production decisions and the size of the subsidy.

9. The butter intervention price will be reduced by an additional 10 percent on top of the 15 percent reduction agreed in the 1999 Berlin reform. As a result, the EU butter market price is projected to decrease by about 7 percent by 2008, with the world butter price increasing by less than 4 percent and EU exports of butter declining by 16 percent (OECD 2005). The estimated changes in EU prices of other major dairy products (milk, cheese, skimmed milk powder) are modest (2 percent) (OECD 2005). These globally modest changes are achieved at a very high price for EU taxpayers: the payments granted to EU dairy farmers to compensate them for the decrease in price support will amount to €4.2 billion—22 percent of the current producer support to milk producers in 2002. The two other products (rye and rice) are marginal—0.3 percent of EU farm production.

10. PSE-based nominal protection coefficients measure the ratio between the average price received by farmers (at the farm-gate level), including payments based on output, and the border price (at the farm-gate level). Some nominal protection coefficients are very high (several hundred percent) because domestic and world prices may react very strongly, making computations difficult and unstable. But it remains that such high nominal protection coefficients reflect huge trade barriers (for instance, trade bans related to mad cow disease in Europe).

11. Hard-core products may be observed in all OECD countries or only in certain OECD members (as shown in table 1.4 by the variances in PSE-based nominal protection coefficients by product). A high variance among PSE-based nominal protection coefficients for a hard-core product would suggest more complex deals, with the most protected OECD countries balancing trade concessions in these products with those available in industrial goods or services.

12. Under the 1996 Farm Bill, U.S. support for major crops tended to increase more rapidly than EC support when world prices were declining—but also to fall more markedly when world prices were rising. As a result, U.S. support has reached the EC level at times of low world prices and been well below EC level at times of high prices. In other words, since 1998 U.S. farmers could reasonably expect—with more and more confidence as years went by—that their desired amount of subsidies would always be granted to them *ex post*. The decoupled status of the U.S. farm policy under the 1996 Farm Bill was increasingly questionable. According to most estimates, the new bill should not prevent the United States from fulfilling its Uruguay Round commitments, except possibly on its aggregate measure of support ceiling under specific conditions.

13. Another signal was the unexpected EC request in July 2002 to roll back its Uruguay Round tariff commitments on grain tariffs and to replace them with tariff rate quotas. This is a source of more uncertainty on the EC farm trade agenda—all the more because the reasons for the proposal are unclear. Invoking increased Russian and Ukrainian grain exports is not convincing (neither country is a WTO member, their exports are sold mostly to non-EC markets, and their increases in exports were caused largely by specific weather and circumstances that are unlikely to be quickly repeated).

14. The focus here is on households in rich countries. Clearly, the impact of reform on prices will also have implications for poor households in developing countries, depending on whether they are net producers or net consumers of the commodities concerned.

15. This figure assumes that all farmers live in rural areas; given that some farmers live in towns large enough not to be counted as rural areas, it is an overestimate.

16. In the 2001 senatorial elections, in which only one-third of all seats were contested, the share of farmers' seats declined from 11 to 9 percent.

17. This problem is conceptually similar to the problem of how to treat entrants in the farm business (existing farmers' heirs or genuine new farmers) in OECD countries. Logically, entrants should not be entitled to the same regime of subsidies as existing farmers. In particular, they should not receive subsidies "compensating" for price decreases and income losses, as they know that markets will be liberalized. Granting them subsidies perpetuates existing distortions.

18. One could argue that the CAP has accelerated, not reduced, the rural exodus (Johnson 1995).

19. Addressing poverty in rural areas may be best achieved by industrialization, inducing the most efficient and largest farmers to stay in agriculture while inducing the least efficient and poorest farmers to leave the sector to become workers in manufacturing activities, with the same or higher income level than the richest farmers. This pattern occurred in Europe in the 1950s and early 1960s.

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THE STRUCTURE OF LOBBYING AND PROTECTION IN U.S. AGRICULTURE

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Many empirical studies, surveyed in this chapter, have investigated and affirmed the role played by lobbies in influencing farm policy, especially in the United States. But few have examined the structure of lobbying at a level of detail sufficient to reveal patterns about who lobbies, who is lobbied, and whether lobbies accomplish their goal of influencing policy. This chapter fills this gap in the literature.

The term *lobby* takes on different meaning depending on the theoretical context. *Informational lobbying* means just that—providing information rather than money. *Quid pro quo lobbying* implies an exchange of money for services in the form of favorable policy. This chapter presents direct and indirect evidence on whether agricultural lobbying in the United States is better characterized as informational or quid pro quo lobbying.

Multilateral negotiations that seek to implement freer trade in agriculture must recognize the political-economic nexus that has led to continuous subsidization and protection of agriculture in developed countries, such as the United States, which has provided such assistance since the 1930s. To the extent that lobbies significantly influence agricultural policy, implementing freer trade in agriculture requires designing incentive schemes that take into account the status quo political-economic equilibrium. Accomplishing free trade in agriculture requires effective bargaining at the international level, performed over policy options that are politically viable domestically, since governments must serve their constituencies first and governments listen to their politically active constituents disparately more than to others.

Although agriculture accounts for less than 5 percent of GDP and employment in developed countries, disputes over farm trade held up the Uruguay Round of negotiations. By design, agricultural protection was virtually ignored in the first four rounds, due to the sector's political sensitivity. Even regional trade agreements routinely exclude agricultural products, inclusion of which could mean the agreement may not succeed. The task of multilaterally negotiating reductions in agricultural protection in the Doha Round is therefore a challenging one. The extent of trade liberalization in agriculture is already being used as a barometer for the round's success. To this end, with the objective of designing implementable agreements in mind, this chapter investigates lobbying and its role in influencing the structure of agricultural protection in the United States.

The chapter proceeds as follows. In section 2.1, three theoretical classes of political economy models that have gained currency in the literature are described and evidence of their validity is presented. This empirical literature on the political economy of agricultural protection provides a flavor for the econometric models and data used in this literature. Section 2.2 analyzes detailed data on lobbying spending by agricultural political action committees (PACs) during 1991–2000. In section 2.3 an econometric model is estimated in order to explore the relationship between lobbying spending and agricultural protection.

2.1 Political Economy Models: A Literature Survey of Theory and Evidence

De Gorter and Swinnen (2002) provide a comprehensive survey of the theoretical and empirical literature on the political economy of agricultural policies in the developed world. Their survey of the literature focuses on three approaches: the Becker-Olson-Stigler model of collective action by lobbies (Becker 1983, Olson 1965, Stigler 1971); politician-voter interaction models in the tradition of Downs (1957); and the Stigler (1971)-Peltzman (1976) approach (termed the “revealed preference” approach by de Gorter and Swinnen), which places different weights on different members of society in the government's objective function.

This chapter's motivation is the same as de Gorter and Swinnen's. As they put it, “Understanding why governments do as they do allows one to analyze the policy formation process and *alter incentive constraints through institutional reform* in order to achieve desired policy outcomes” (italics mine) (2002, p. 1903). While their survey examines the agricultural economics literature on political economy, it does not examine important and relevant developments outside that literature. The aim of this chapter is to complement their work with an analytical survey of recent models about pressure groups that has begun to receive attention in the literature. Of specific interest is the debate over how those pressure groups operate.

One set of models emphasizes that pressure groups lobby by paying for services. The other set maintains that pressure groups seek to informationally lobby policy makers and that money primarily buys access, not the policy itself. It is hoped that the analysis in this chapter informs that debate in the context of agricultural policy.

2.1.1 Olson-Peltzman-Stigler Interest Groups

Anderson (1992) sets out a unified framework to explain two stylized facts about agricultural protection. The first is that special interests matter. The second is that both developed and developing countries protect their agriculture, but trade barriers are far higher in developed countries. Anderson's political economy model, built on the foundations of Olson (1965), Stigler (1971), and Peltzman (1976), supposes that the government supplies (positive or negative) price support policies for the sector in response to demand for such assistance by vested interests, mainly farmers.¹

Figure 2.1 depicts this partial equilibrium model. The price in this political market is political support for the government in the form of lobbying contributions to electoral campaigns (other forms of political support could be used as well). The negatively sloped demand curve represents the marginal willingness of farmers to pay for increased assistance. Willingness to pay declines as the amount of assistance increases, because more assistance encourages entry of new firms,

Figure 2.1 The Political Market for Government Assistance to Agriculture

Source: Anderson 1992.

spreads the benefits over more firms, and exacerbates the free-rider problem of collective lobbying action by the group. The positively sloped supply curve represents the marginal political cost to the government of providing assistance. This cost increases with the amount of support, because greater intervention causes greater welfare losses, thus weakening electoral support from adversely affected consumers.

The quantity of assistance is measured as the effective protection coefficient, the percentage by which policy increases value-added for agriculture relative to the average effective protection coefficient for other sectors of the economy. In figure 2.1 equilibrium in developed countries occurs at a quantity greater than one, indicating that agriculture receives more protection on average than other sectors. Equilibrium in developing countries occurs at a quantity less than one, indicating that agriculture is discouraged relative to other sectors.

This policy disparity between developed and developing countries has been well documented in the literature. According to Anderson (1992, 1995), this disparity is due to dissimilar distributional effects of policy intervention in the two types of economies and to differences in the relative costs of collective action by interest groups. If capital, including land, is sector specific and labor is mobile, the distributional effects of a policy that alters farm prices is determined by its impact on wage costs and the share of the expenditure on food. In a poor agrarian economy, raising the relative price of agricultural products can substantially raise wage rates by increasing labor demand in the labor-intensive agricultural sector. This substantially lowers the income of owners of land and industrial capital. Together with the high costs of maintaining a lobbying organization (farms are small and farmers numerous, making the free-rider problem insurmountable), this makes for weak demand for farm price support policies relative to demand for policies that support the industrial sector. The demand and supply curves in political markets in developing countries therefore intersect toward the lower left in figure 2.1.

In rich industrial economies, farmers represent a small proportion of the labor force. Raising the relative price of farm products has little impact on the demand for labor and consequently wages. Counterlobbying by consumers is thus not an issue. Furthermore, since people spend a small part of their income on farm products, they are less sensitive to an increase in farm prices. As a result, the supply curve in industrial economies is far to the right of that in developing countries; the demand curve lies to the right as well. Farms are large, and the stakes from price support policies are high. Institutionally, commercialization of agriculture has given rise to cooperatives, which has also reduced the free-rider problem of political organization in this sector.

A simulation exercise by Anderson (1994) suggests that an increase in the relative price of farm products would raise farm owner-operators' real incomes in the

typical poor country by only one-tenth as much as it would reduce the real incomes of industrial capitalists. A similar price policy shock in the typical rich country raises farmers' real incomes substantially more than it reduces the incomes of industrial capitalists.

Moreover, the real incomes of nonfarm workers would be lowered by four times as much in the poor country as in the rich country. Nonfarm workers would be more inclined to join industrialists in opposing price support policies in a poor country than in a rich one. Even poor countries with a wealthy landed aristocracy are likely to adopt policies that discriminate against agriculture, since landowners typically are also to some extent industrial capitalists. Anderson's simulation exercise suggests that if landlords earned as little as one-sixth of their income from industrial capital, they would prefer policies that lower the domestic price of farm products relative to industrial products. This helps explain why Krueger, Schiff, and Valdes (1988) find agriculture to be only slightly less discriminated against in developing countries with concentrated land ownership than in those with a more even distribution of land.

Other authors have extended the pressure group model to explain agricultural price policy. De Gorter and Swinnen (1994) and Swinnen (1994) develop politician voter models, building on the work of Stigler (1971), Downs (1957), and de Gorter and Tsur (1991). Their main conclusion can be summarized in five testable propositions: politicians increase agricultural subsidies as real agricultural income falls, the equilibrium subsidy increases as the share of agriculture in total output decreases, the equilibrium subsidy increases as capital intensity increases (inside and outside agriculture), the equilibrium subsidy increases as supply elasticity increases, and demand elasticities influence the subsidy for large importers and exporters.

Empirical evidence about agricultural protection using the framework of Anderson (1992), Anderson and Hayami (1986), and Swinnen (1994) is plentiful. Olper (1998) employs a reduced-form econometric model to explain the structure of Common Agricultural Policy transfers in eight countries in the European Union (EU). He considers effective and nominal protection rates in these eight countries annually between 1975 and 1989. The explanatory variables are (loosely) motivated by the pressure group model of Becker (1983) and Olson (1965); extensions of the model of voter-politician interactions by de Gorter and Tsur (1991), Swinnen (1994), de Gorter and Swinnen (1994); and the model of altruism by Bullock (1994).

Olper's panel regression estimates yield three findings. First, agricultural protection increases under adverse market conditions for the farming industry, supporting the countercyclicity hypotheses of Bullock (1994). Second, countries with a comparative disadvantage in agriculture enjoy greater protection in agriculture,

supporting the view that Stolper-Samuelson effects motivate losers from liberalization to organize politically. Third, a high budget share for food consumption reduces protection, perhaps indicating government's concern for welfare losses from protection. In sum, both special interests and government concern for welfare determine the structure of transfers under the Common Agricultural Policy.

Using panel data on 14 industrial countries between 1955 and 1987, Honma (1993) investigates whether Japan's agricultural protection is determined according to the Anderson-Hayami (1986) framework of endogenous protection. The dependent variable in his regression is the nominal protection coefficient, measured as the ratio of the value of agricultural output in domestic prices to its value in border prices. Its log represents a rate of difference between the output valued in domestic and border prices.

Honma's analysis yields four main findings. First, the nominal protection coefficient declines with comparative advantage in agriculture, measured as the ratio of labor productivity in agriculture to labor productivity in industry. Second, there is an inverted-U shaped relationship between the nominal protection coefficient and the share of agriculture in output (or employment), with a threshold value of that share equal to 4.5 percent (that is, the nominal protection coefficient rises as the share in agriculture increases to 4.5 percent and falls beyond that). Third, the nominal protection coefficient increases as the terms of trade (measured as the ratio of the index of the world export unit value of agricultural products to the export unit value index of manufactured goods) decline in agriculture. Fourth, region-specific dummies indicate that EU and other non-aligned European countries had a far higher growth in nominal protection coefficient than either Japan, the new industrializing economies of Asia, or the United States.

Honma concludes that as economies reach advanced stages of development, the political environment favors protection in the agricultural sector, for two reasons. First, the relative contraction of agriculture in the total economy reduces consumers' resistance to agricultural protection. Second, the contraction of agriculture leads to greater concentration, making political lobbying by farmers more efficient. On Japanese protection, Honma concludes that while pre-1975 growth in the nominal protection coefficient was due largely to changes in comparative advantage, after 1975 the main determinant was the declining terms of trade against Japanese agriculture.

While the ideas presented in the next two classes of models have existed informally in the literature over many years, only recently have they been modeled using well-defined objective functions and solved formally in order to investigate the properties of the equilibrium solutions. The first class of models takes the position that both lobbyists and policy makers view lobbying as essentially providing

information. Money plays the secondary, albeit important, role of buying access to policy makers. This theory of lobbying, originally developed in Bauer, Pool, and Dexter (1963) and Milbraith (1960), has received formal treatment in Ainsworth and Sened (1993), Austen-Smith (1995), Bennedsen and Feldman (2002), and Wright (1990). Hansen (1991) finds the theory of informational lobbying relevant and applicable to U.S. agricultural policy during the 20th century. The second class of models considers lobbying as a means of buying favorable policy, not merely access. This view is most effectively put forth in Grossman and Helpman (1994).

2.1.2 Informational Lobbying

Ainsworth and Sened (1993) offer a sophisticated nonexchange-based rationale for the emergence of lobbies. Their thinking is that lobbies endogenously emerge whenever there is uncertainty on the part of politicians about the true demand for the public goods they have the power to provide. Thus the focus is on the informational role lobbies provide. Lobbies endogenously form, because their existence improves the efficiency of the interaction between government and particular interest groups by providing information more economically than the government could obtain by itself. Of course, lobbies are not able to provide information about true demand, only signals. But these signals enable inefficient equilibriums to be eliminated. Essentially, lobbies are able to create a surplus due to such informational efficiencies, which politicians and lobbies share, leaving both better off. This model may be appropriate for explaining the boom in the number of issue-based lobbies, such as green lobbies. The theory is difficult to test, however, because it offers few clues about what the reduced-form function for (some measure of) lobbying might look like.

Hansen (1991) makes a strong case for the relevance of informational lobbying in his study of the politics of U.S. agricultural support policies. His informal yet intuitive theory is based on his observations about the interactions between Congress and the farm lobby between 1919 and 1981. The theory is designed to explain three stylized facts about how the farm lobby gained and lost access to Congress over this period.

In the 1950s and 1960s, farm policy makers dropped the American Farm Bureau Federation (AFBF) from its dominant position in agricultural politics. The AFBF had been agriculture's leviathan for a generation. In the 1960s and 1970s, commodity organizations replaced the position previously occupied by the AFBF. During this period, farm policy makers paid less and less attention to the advice of farm lobbies. In the 1970s and 1980s, this trend was reversed and policy makers scarcely paid attention to the advice of the consumer lobby. During these

40 years, Congress reallocated access within the farm lobby, restricted access for the farm lobby, and denied access to the consumer lobby.

Hansen develops a theory to explain these changes in access. He maintains that politicians grant access to lobbies on the basis of their informational advantage over other lobbies and the permanence of the issues and positions they represent. His theory of access is based not so much on the direct monetary contributions by lobbies as on their informational contributions. In his view, money does not cause votes, information does. Hansen finds that his theory provides satisfactory explanations of the three observations made above.

Austen-Smith (1993) focuses on lobbying committee members in order to influence their votes as well as shape the committee's agenda. In this model lobbying is the mechanism for transmitting strategic information from interest groups to committee members. Austen-Smith finds support for his theory in Hansen's finding that there was widespread transmission of information from the farm lobby to the agricultural committee, despite (or perhaps because of) the fact that lobbyists' preferences on issues such as price supports opposed those of the House as a whole.

Austen-Smith (1995) develops a model of access through campaign contributions in which the role of lobbying is primarily to reveal to the policy maker the policy preferences of the lobbyist. To put this model in the context of agricultural policy, consider a hypothetical example. Say that it is common knowledge that agriculture will be scrutinized in the coming legislative session, but it is not clear whether issues such as price supports will consume the agenda. Lobbyists pay to purchase the option to speak to the legislator should such an opportunity arise. In this model money exchanges hands *before* details of the legislative agenda are revealed. The sequence of steps in this game is as follows. First, the group chooses how much it will contribute. Second, it is revealed which specific issues will be addressed by legislators. Third, if the issue is relevant to the group, the legislator chooses whether to grant access to the lobbyist. Fourth, if access is granted, the group makes its lobbying speech, the legislator makes a decision, and the payoff is distributed. Austen-Smith's model is able to theoretically explain the strong positive correlation between lobbying contributions and the similarity in preferences between lobbies and the legislators they woo.

Kollman (1997) finds a strong empirical correlation between the preference biases of lobbyists and the committee members they lobby. But unlike Austen-Smith, who believes the relationship is causal, Kollman believes it reflects the common preference biases of legislators and lobbyists, which brings them together.

Bennedsen and Feldman (2002) extend these models of informational lobbying with a single decision maker to address the fact that the purpose of lobbying is ultimately to influence legislation, which is made by Congress. Hence any complete theory of informational lobbying must take into account the process by

which majorities are formed during the making of legislation. They develop a theory whose main conclusion is that the ability to create majorities in Congress provides the necessary incentives to lobby groups to carry out their activities.

The findings in Wright (1990) empirically motivate the relevance of the Bennedsen-Feldman model. Wright surveyed lobbies that had contacted members of the Ways and Means Committee and the Agriculture Committee of the U.S. House of Representatives. His inference that money contributions plus informational lobbying influenced voting by Ways and Means affirms the view that informational lobbying matters. Wright finds that lobbying mattered more than money to Ways and Means Committee members (that is, money bought access in order to informationally lobby).

Wright's findings have two implications. First, lobbyists allocate their scarce resources over a set of influential decision makers. Second, lobbying is informational. The Bennedsen-Feldman contribution is thus more relevant than previous theoretical models that presumed informational lobbying of an individual decision maker.

Wright finds very weak evidence of informational lobbying of the House Agriculture Committee, the committee that determines the content of farm bills. In Wright's data, strong collinearity among regressors makes it impossible to make reliable inferences about informational lobbying of the Agriculture Committee. Wright attributes the weak finding to the fact that the Agriculture Committee deals with a narrow and well-defined set of issues on a periodic (five-year) basis. This distinguishes it from Ways and Means, which deals with a range of diverse issues, often on an ad hoc basis. Both leaders and rank-and-file members of the Agriculture Committee have ample opportunity to interact regularly with lobbies. The preferences of these lobbies have been fairly constant over time and are therefore well known to Agriculture Committee members. In contrast, Ways and Means Committee members often encounter lobbyists on an issue-by-issue basis, so that informational lobbying by those lobbies is influential at the margin. In contrast, informational lobbying of Agriculture Committee members is not influential at the margin in the formation of coalitions.

Parker and Parker (1998) endorse the view that Agriculture Committee members maintain strong, continuing links with PACs whose preferences have been stable over time. They distinguish between committees in the House in which voting does not change as issues move from committee to the floor from committees in which voting does change. Agriculture and Ways and Means are the highest-ranked committees in terms of the stability of coalitions as their issues move from committee to the floor.² Parker and Parker take this to imply that the influence of special interests on forming preferences of committee members on these committees is strong. In other committees, members often change their votes on the floor, indicating that their preferences were weak to begin with.

In sum, evidence on the relevance and effectiveness of informational lobbying, at least in the context of agricultural policy, is an open issue and deserves further investigation. Hansen finds evidence of informational lobbying, while Parker and Parker do not. Hansen's is a long-term exercise and identifies threshold points in time during which legislators sought better information because they recognized it to be marginally effective in increasing electoral strength. Shorter-run studies do not find this to be the case.

2.1.3 *Quid Pro Quo Lobbying*

In contrast to Hansen (1991), Grossman and Helpman (1994) put forth a theory of how policy responds to lobbying contributions. In their model money causes votes and is the source of electoral strength. A stylized fact that supports this view is that lobbying contributions account for up to 80 percent of a congressperson's total campaign expenditures. With soft money playing a bigger role in recent years, this proportion has increased on average. Among the models of special interest that have been advanced in political economy, the Grossman-Helpman model yields the sharpest testable conclusions.

The model is a small open economy model. A numeraire good is produced using only labor, which fixes wages. The economy produces n goods, using constant returns to scale technology with labor and sector-specific capital. Trade policy is quantified in the domestic price vector p . An import tariff or export subsidy on good i raises p_i above the world market price π_i . Conversely, an import subsidy or export tax on good i lowers p_i below the world market price π_i . Net government revenues are redistributed on a lump-sum basis. Individuals in the economy differ only in their ownership of sector-specific factors. Each individual owns specific capital in at most one sector, and the total supply of specific capital in any sector is inelastic. Hence the reward to sector-specific input in good i is increasing in p_i .

Government maximizes a weighted sum of welfare and lobbying contributions (free trade would be the efficient outcome if government maximized only welfare). Capital owners in some sectors L organize into interest groups in order to attempt to influence government policy. Through lobbying contributions, the lobby representing sector i aims to increase p_i , decrease the prices of other goods (since lobby members consume other goods or use them as intermediate goods in the production of their own good, decreasing their price raises their welfare), or both. Lobby i offers government contingent campaign contributions $C_i(\mathbf{p})$, conditional on the trade policy $\mathbf{p}$ that the government chooses.

Grossman and Helpman model the lobbying game as a menu auction. After the lobbies submit their contingent contribution schedules, the government sets trade policy $\mathbf{p}$. In a *pure* menu auction, every lobby makes a menu of offers to the government (the menu may, and probably will, comprise zero contributions

corresponding to subsets of the policy space), and the government auctions policy to the highest bidder. A pure menu auction would be the case if the government were interested purely in contributions and not welfare. Government maximizes a weighted sum of campaign contributions C and gross welfare W (where a is the weight the government places on a dollar of welfare relative to a dollar of campaign contributions):

$$G = aW + C. \quad (2.1)$$

Thus the Grossman-Helpman model is more than a pure menu auction model. It is better described as a common agency model in which lobbies are the principals and government is the common agent. The common agency problem has been formulated and solved by Bernheim and Whinston (1986).

On the lobbying side, Grossman and Helpman posit that equilibrium lobbying contribution schedules (that is, the menus they offer the government) are the result of lobbying competition and are determined in a Nash equilibrium. In selecting their menus, every lobby takes into consideration the maximization of equation (2.1) by the government. Take the example of an economy with just one lobby, in sector 1. With negligible membership relative to the population, lobby 1 is interested purely in p_1 , which it would like the government to set above the world price π_1 . The lobby submits a menu of offers, given by its contribution schedule $C_1(p_1)$, which is in turn determined by maximizing the sum of the individual members' welfare functions, $\sum_{i \in L} W_i(p_i)$.³ The government can choose either to set p_1 at a level above the world price and collect the contribution associated with that level, or it can ignore the lobby and collect zero contribution. Let G^* denote the value of the political welfare function if $p_1 = \pi_1$. In order to obtain a more favorable policy, lobby 1 must ensure the government a political welfare of at least G^* . That is, it must compensate the government to the extent of the welfare loss from protecting sector 1. The lobby gets to keep any surplus (the aggregate change in the welfare of each member net of contributions). When there is more than one lobby, there is competition among lobbies, which may have to contribute beyond the welfare loss to the government.

On the protection side, the model predicts that the cross-sector pattern of protection is given by

$$\frac{t_i}{1 + t_i} = \left(\frac{-\alpha}{a + \alpha} \right) \times \frac{z_i}{e_i} + \left(\frac{1}{a + \alpha} \right) \times \left(I_i \times \frac{z_i}{e_i} \right), \quad (2.2)$$

where $t_i = (p_i - \pi_i)p_i$ is the ad valorem tariff or export subsidy for good i in equilibrium, and I_i is an indicator variable that equals one if sector i is organized into a lobby. The parameter $\alpha \leq 1$ is the fraction of the population organized into lobbies. The government preference parameter in equation (2.1) is $a > 0$, indicating the weight the government places on \$1 of welfare relative to \$1 of political contributions. The equilibrium ratio of domestic output to imports is $z_i = x_i/m_i$,

and e_i is the absolute elasticity of import demand.⁴ If sector i is a net importer, it is protected ($t_i > 0$) or obtains an import subsidy ($t_i < 0$), depending on whether it is organized ($I_i > 0$) or not ($I_i < 0$).

Equation (2.2) may be interpreted as follows. The second component on the right-hand side indicates that protection to *organized* sectors is given according to their z/e ratios. Since deadweight loss from protection is higher in industries with high import elasticities, all else equal the government is averse to protecting these industries. The variable z measures the stakes from protection; industries with high z values will make larger lobbying contributions. The lower the import volume, the lower the social cost imposed on individuals, thus diluting their opposition to protection of that sector.

The first component on the right-hand side of equation (2.2) indicates that negative protection to *unorganized* industries is given according to their z/e ratios. The variable measures the extent of opposition to protection. If only a negligible fraction of the population were organized into lobbies ($\alpha = 0$), there would be no organized opposition to protecting any sector (only organized support for protecting a lobby's own sector). If everyone were organized ($\alpha = 1$), then organized lobbying for protection in any sector would be balanced by organized opposition to that protection, and tariffs would be zero.

These predictions have been investigated empirically using data from the United States (Gawande and Bandyopadhyay 2000, Goldberg and Maggi 1999); Turkey (Mitra, Thomakos, and Ulubasoglu 2002); and Australia (McCalman 2004). All of these studies affirm the predictions qualitatively. Gawande and Bandyopadhyay also examine the lobbying side of the Grossman-Helpman model. They affirm the fundamental prediction that contributions increase with deadweight loss from protection. They also find that lobbying spending rises with the share of an industry's output used by politically organized downstream industries.

Gardner's (1987) work on explaining agricultural protection, which predates the Grossman-Helpman model, is prescient about its key features. In this model, government maximizes the weighted sum of buyer's surplus (B) and producer's rents (R), which are functions of farm output quantities, $W = B + \theta R$. Efficient redistribution using production controls in this framework requires choosing quantities of farm products to maximize W .⁵ Unlike Grossman and Helpman, who adopt a formal model of the lobbying process and are consequently able to provide micro foundations for their objective function, Gardner does not provide micro foundations for W . However, he uses Peltzman's (1976) "majority generating function" as the argument for using this type of objective function. According to him, the same forces that determine lobbying effectiveness determine the value of the parameter θ . Gardner measures these forces for 17 farm commodities by the number of producers, their geographical dispersion, the stakes from redistribution (output per farm), and the stability of the industry

(variability of production patterns). He also estimates (long-run) demand and supply elasticities for these commodities.

Pooling data across the 17 commodities over the period 1912–80 yields a sample of 1,124 observations. The dependent variables measuring intervention differ across different commodities, but they are variants of the nominal protection coefficient. Gardner finds that the lower the (inverse) demand elasticity, the greater the level of intervention, that is, the higher the price relative to the nondistorted price. This is a confirmation of the Grossman-Helpman intuition that it is most efficient to tax commodities with the lowest price elasticities of demand. It is the basis for Gardner's conclusion that interventions in U.S. agriculture have been efficient.

From the coefficients of other explanatory variables, Gardner finds strong support for the political economy model view of price supports in the United States. He finds the following:

- There is an inverse-U relationship between the number of producers and producer protection.
- Geographical concentration leads to greater protection.
- Prolonged concentration of production in a few states increases protection.
- Protection decreases as farm income rises and as prices improve.
- Imported commodities receive greater price supports than domestic goods.
- The greater the share of output exported, the greater the amount of price support.

All of these coefficients support some political economy model, though the precise connection is not made clear formally and the connection of the variables to any underlying theory is tenuous. Nevertheless, the collective evidence in favor of the influence of special interest is impressive.⁶

2.2 Graphical Analysis of PAC Contributions 1991–2000

Raw lobbying data for the five congressional election cycles between 1991 and 2000 (the 103rd through the 106th Congresses) were downloaded from the Federal Election Commission Web site (<http://www.fec.org>). The data are in three data files: candidate information files, PAC committee information files, and files on transactions between PACs and candidates. For each election cycle, aggregate contributions by each PAC to every candidate were computed from the files on transactions between PACs and candidates and then merged with the relevant cycle's candidate information files. House and Senate files were separated for each cycle. Congressional committee and subcommittee assignments for each Congress were obtained from *Congressional Quarterly* (1991–99).

Mapping from PACs to Standard Industrial Classification (SIC)-based agriculture-related sectors makes use of the concordance constructed by Beaulieu

and Magee (2004).⁷ In general, the mapping is from many PACs to many SIC codes. For many-to-one mappings, the contributions were simply aggregated for each SIC code. For one-to-many mappings, political contributions from each PAC were fractionally assigned equally to each SIC code into which the PAC mapped. To check the consistency of the PAC data, they were compared with the data on the *opensecrets.com* Web site. Both sets of data are very comparable, both in the aggregate and in sectors for which *open secrets.com* reports data.

2.2.1 PAC Spending across Agriculture-Related Sectors

Figure 2.2 shows the breakdown of PAC contributions by two-digit SIC agriculture-related sectors in the 1991–92 and 1999–2000 election cycles. The striking feature here is that contributions held fairly steady over the 10-year period, with the same PACs contributing fairly predictable amounts of money over this period. Rather than use the two-digit descriptions, subsequent figures break down farm PACs by seven products (wheat, dairy, sugar, vegetables and fruits, cotton, ranch, and other).

Figure 2.3 depicts the total contribution by agriculture-related sectors for each of the five election cycles between 1991 and 2000. In order to compare farm PAC

Figure 2.2 Agriculture PAC Spending, 1991–92 and 1999–2000 Election Cycles

Source: Author's calculations.

Figure 2.3 PAC Contributions by Agriculture-Related Sector, 1992–2000

Source: Author's calculations.

contributions with other agriculture-related sectors, it shows contributions by PACs in the farm equipment, agricultural services, crop-processing services, distribution, forestry/nursery, and food manufactures sectors.

Farm PACs contributed \$5.5–\$7.0 million during each of these five election cycles. Among farm products the most politically active PACs were those for sugar, dairy products, and ranch products. Together these three PACS accounted for about 75 percent of total farm PAC contributions.⁸

More than 200 PACs in the agriculture and related sectors were politically active during this period (tables 2.1 and 2.2). Among farm PACs, cotton, dairy, and wheat had the highest degree of concentration. Wheat and cotton farms were represented politically almost entirely by four PACs. Dairy products, ranch products, and sugar also had high levels of PAC concentration. The inverse of the Herfindahl indexes represents the number of equal-sized PACs active in each

TABLE 2.1 Four-PAC Concentration Ratio, 1991–2000

	1992	1994	1996	1998	2000	Average
Wheat	0.956	0.942	0.892	0.950	0.939	0.936
Dairy	0.866	0.881	0.863	0.835	0.843	0.858
Sugar	0.646	0.676	0.655	0.652	0.620	0.650
Vegetables	0.527	0.512	0.469	0.495	0.401	0.481
Cotton	0.953	0.948	0.887	0.899	0.897	0.917
Ranch products	0.704	0.673	0.601	0.644	0.639	0.652
Other	0.611	0.597	0.676	0.569	0.503	0.591
Equipment	1.000	1.000	1.000	1.000	1.000	1.000
Agricultural services	0.608	0.573	0.523	0.590	0.610	0.581
Crop processing	1.000	1.000	1.000	1.000	1.000	1.000
Distribution	0.633	0.551	0.690	0.694	0.642	0.642
Forest/nursery products	0.464	0.371	0.377	0.437	0.445	0.419
Manufactured products	0.513	0.465	0.456	0.458	0.451	0.469

Source: Author's calculations.

TABLE 2.2 Herfindahl Index, 1991–2000

	1992	1994	1996	1998	2000	Average
Wheat	0.326	0.301	0.336	0.294	0.329	0.317
Dairy	0.333	0.320	0.287	0.329	0.384	0.331
Sugar	0.127	0.164	0.134	0.140	0.121	0.137
Vegetables	0.099	0.084	0.076	0.084	0.065	0.082
Cotton	0.340	0.411	0.296	0.364	0.363	0.355
Ranch products	0.143	0.154	0.144	0.152	0.152	0.149
Other	0.127	0.149	0.141	0.114	0.099	0.126
Equipment	0.593	0.603	0.463	0.479	0.538	0.535
Agricultural services	0.121	0.113	0.104	0.130	0.143	0.122
Crop processing	0.986	1.000	0.976	0.893	0.901	0.951
Distribution	0.136	0.110	0.154	0.165	0.132	0.139
Forest/nursery products	0.077	0.059	0.060	0.075	0.073	0.069
Manufactured products	0.083	0.105	0.071	0.073	0.073	0.081

Source: Author's calculations.

sector. Hence cotton, dairy, and wheat each had the equivalent of three to four equal-sized PACs representing them politically. Ranch products, sugar, and fruits and vegetables were represented by the equivalent of 8–10 PACs.⁹

One message is that a high degree of concentration among PACs does not translate unconditionally into high PAC spending. Wheat PACs are highly concentrated, for example, but their spending is small (see Gardner 1996 and

below). Beyond organization, the stakes from favorable policy appear to be an important determinant of PAC spending.

An instructive case study of the influence of PAC money is that of the sugar lobby. Brooks, Cameron, and Carter (1998) estimate a simultaneous model of voting on sugar legislation and PAC contributions. They investigate whether PAC contributions influence congressional voting and whether influencing congressional voting is a motivation for how PACs target their limited PAC spending. They examine House sugar votes in 1985 and 1990. The 1985 House amendment to lower the loan rate by \$0.01 a year until it reached \$0.15 a pound was defeated 142–263. The 1990 House amendment to lower the loan rate on sugar from \$0.18 to \$0.16 per pound until 1995 was defeated 150–271.

Both votes were responsive to sugar PAC contributions as well as to counterlobbying by sweetener-user PACs. The value of sugar production in a member's constituency also determined voting. Surprisingly, committee membership and ideology appeared to play no part in these votes. Party membership, generally found to be a crucial variable in the literature analyzing voting, is excluded from the voting equation.

Sugar lobbying contributions targeted members with a high propensity to be pro-sugar. The number of sugar farms in the recipients' district is an important determinant of sugar PAC contributions. Committee membership is a statistically significant determinant of lobbying spending by sugar PACs (but the signs on the committee dummy reverse from 1985 to 1990). Counterlobbying in 1985 is poorly explained by the variables included.

For the 1990 sugar vote, the value of sugar production in the state was a statistically significant explanatory variable. Contributions by sugar PACs targeted senators with a propensity to vote pro-sugar, Democrats, and senators with seniority. Interestingly, lobbying competition from sweetener users increased sugar PAC contributions. Surprisingly, committee membership did not appear to matter. Counterlobbying by sweetener users responded largely by lobbying sugar PAC contributors. The main message from this result is that lobbying competition did play a role in the 1990 Senate sugar vote.

Wheat, in contrast, provides a case study of a sector that is politically not very strong but has nevertheless managed to obtain subsidies. Gardner (1996) analyzes the persistence of these export subsidies, through the costly and ineffective Export Enhancement Program. The political economy of the program is best viewed as organized pressure groups (wheat producers, other grain producers, wheat exporters) that stood to gain considerably from the program winning at the expense of unorganized consumers and domestic grain processors, who lost between \$250–\$600 million a year. Foreign governments, the buyers of subsidized wheat, also gained considerably. Alternative policies that would have left the economy better off were politically less appealing. Gardner observes that in order for

alternative policies to have a chance of succeeding politically, farmers must first buy into them, since the agricultural committees take their cue first and foremost from farmers. If farmers are united, only organized public opposition can sway politicians. Such opposition has been absent for food subsidies in general and the Export Enhancement Program in particular. Gardner also emphasizes the role played by other institutional features in maintaining the longevity of the program. The Office of Management and Budget designates the program as budget neutral because of large government stocks of wheat (in the past decade these stocks have been depleted considerably).

2.2.2 PAC Spending across Policy Makers

Ultimately, politicians deliver favorable policy. Thus PAC spending may be directed at electing politicians who have a high probability of delivering favorable policy, gaining access to politicians who have influence over policy, or both. Whether PAC money influences election outcomes has been the subject of a

Figure 2.4 Total Agricultural PAC Contributions to House and Senate Candidates, by Party, 1991–2000

Source: Author's calculations.

Figure 2.5 Top 20 House Recipients of Agricultural PAC Contributions, 1991–92 Election Cycle

Source: Author's calculations.

Note: AG-Agriculture Committee; CA-California; CCRD-Conservation, Credit, and Rural Development; CO-Colorado; CRS-Cotton, Rice, Sugar; D-Democrat; DMCRN-Domestic Marketing, Consumer Relations, and Nutrition; DORFA-Department Operations, Research, and Foreign Agriculture; FFFE-Forests, Family Farms, and Energy; GA-Georgia; IA-Iowa; KS-Kansas; LA-Louisiana; LDP-Livestock, Dairy, and Poultry; MI-Michigan; MO-Missouri; MT-Montana; NC-North Carolina; OK-Oklahoma; PT-Peanuts and Tobacco; R-Republican; TX-Texas; VA-Virginia; WI-Wisconsin; WSFG-Wheat, Soybeans, and Feedgrains.

number of studies, the results of which are at best mixed. The consensus in the literature seems to be shifting in the direction of PAC spending as an instrument with which to gain access to, or provide quid pro quo payments for, policy.

Figures 2.4–2.18 investigate which politicians agricultural PACs target.¹⁰ Figure 2.4 shows the distribution of agricultural PAC contributions to candidates for the House and Senate over five election cycles, by party. In the 1991–92 and 1993–94 election cycles, two-thirds of agricultural PAC contributions went to House candidates and one-third to Senate candidates. Among House candidates Republicans and Democrats received almost equal contributions. Among Senate candidates agricultural PACs appear to have favored Republicans.

This picture changed dramatically during the 1995–96 election cycle. Total contributions by agricultural PACs were 15 percent greater than the previous

Figure 2.6 Top 20 House Recipients of Agricultural PAC Contributions, 1993–94 Election Cycle

Source: Author's calculations.

Note: ECRD-Environment, Credit, and Rural Development; FAH-Foreign Agriculture and Hunger; IL-Illinois; KY-Kentucky; SCNR-Specialty Crops and Natural Resources; WA-Washington.

cycle, with Republican candidates for House and Senate seats receiving the lion's share of these contributions. Agricultural PACs thus appeared to facilitate the eventual Republican majority in both the House and Senate, the first time in decades that the Republicans enjoyed majorities in both houses. It would be tempting to conclude that agricultural PAC money was able to influence electoral outcomes, a view that goes against the grain in the literature. In fact, anticipation of Republican majorities in the House and Senate led agricultural PACs (and most other corporate PACs) to contribute heavily to Republicans. Republicans were viewed as pro-business and more likely to provide favorable policy than Democrats. Contributions by agricultural PACs in the 1997–98 and 1999–2000 election cycles continued to have a Republican skew, though total contributions declined from the 1995–96 level.

Figure 2.5 shows the top 20 House recipients of agricultural PAC money during the 1991–92 election cycle. A striking feature is the presence of many

Figure 2.7 Top 20 House Recipients of Agricultural PAC Contributions, 1995–96 Election Cycle

Source: Author's calculations.

Note: ID-Idaho; NM-New Mexico; OH-Ohio; OR-Oregon; RMSC-Risk Management and Specialty Crops.

House Agriculture Committee members on this list. In 1991–92 the House Agriculture Committee included 27 Democrats and 18 Republicans. Of these, 15 appeared in the top 20 list.

The 1991–92 Agriculture Committee comprised eight subcommittees.¹¹ The chair of the committee (Rep. Kika de la Garza [Texas]) and three committee chairs (Reps. Jerry Huckaby [Louisiana], Charles Stenholm [Texas], and Charlie Rose [North Carolina]) were on the top 20 list. This pattern of giving to candidates strongly suggests that agricultural PACs sought influence. Agricultural PACs clearly targeted members of the Agriculture Committee, specifically those wielding influence over agriculture policy. The amounts themselves were not inconsequential. For many candidates on the top 20 list, agricultural PACs are a major source of campaign contributions. Figure 2.10 indicates that contributions from agricultural PACs represented between 7 percent (Rep. Bonior) and 60 percent (Rep. Kika de la Garza) of the total PAC money received by candidates in the

Figure 2.8 Top 20 House Recipients of Agricultural PAC Contributions, 1997–98 Election Cycle

Source: Author's calculations.

Note: AL-Alabama; DONFA-Department Operations, Nutrition, and Foreign Agriculture; MN-Minnesota; NM-New Mexico.

agricultural PACs top 20.¹² It is thus not unlikely that the agricultural PAC money may have played a role in influencing election outcomes. Figure 2.11 shows that the top 20 recipients of agricultural PAC contributions during the 1999–2000 election cycle received significant shares of their total PAC contributions from agricultural PACs. Whether agricultural PAC money influenced electoral outcomes is left as an open issue deserving further research.

Returning to figure 2.5, some officials in this top 20 agricultural money list are not members of the Agricultural Committee (Reps. Fazio, Edmondson, Bliley, Bonior, and Anthony). However, with the possible exception of Rep. Anthony, all are from congressional districts with influential agricultural constituents (California, Oklahoma, Virginia, and Michigan). For example, according to the Census of Agriculture, Rep. Fazio's district was among the 30 leading congressional districts by market value of agricultural products sold in 1997, and Rep. Edmondson's district was among the 30 leading cattle and calves districts.

Figure 2.9 Top 20 House Recipients of Agricultural PAC Contributions, 1990–2000 Election Cycle

Source: Author's calculations.

Note: AR-Arkansas; FL-Florida; LH-Livestock and Horticulture; RMRSC-Risk Management, Research, and Specialty Crops.

Contributions to Agriculture Committee members and membership on the Agriculture Committee are not independent of each other. The received wisdom in the literature is that representatives from districts with agriculturally influential constituencies seek out membership on the Agriculture Committee and lobby hard for positions of influence on its subcommittees. Consequently, they are in a position to influence agriculture policy, especially during passage of the farm bills every five years. Their influential positions endear them to PAC influence. Contributions from agricultural PACs and the ability to influence agriculture policy are therefore simultaneously determined.

Figures 2.5–2.9 show the top 20 agricultural PACs from the five election cycles between 1991 and 2000. They reinforce the previous observations. Candidates who appear in the list but are not members of the Agriculture Committee belong to districts with agriculturally influential constituencies.

A natural experiment that the cycles provide is the switch from a Democratic to a Republican majority in 1995. During the 1991–92 and 1993–94 Congresses,

Figure 2.10 Contributions from Agricultural PACs and Ratio of Agricultural PAC Contributions to Total PAC Receipts among Top 20 House Recipients, 1991–92

Source: Author's calculations.

most of the top 20 recipients who were Agriculture Committee were Democrats; after 1995, most of the top recipients were Republican. This pattern reinforces the view that agricultural PAC money was not party driven (or ideological) but rather sought influence.

The pattern of giving to Senate candidates appears to be very similar to the pattern of giving to candidates up for House elections: the top 20 Senate recipients of agricultural PAC money received contributions that were roughly similar to those of the top 20 House recipients, suggesting that agricultural PACs view these top 20 senators and representatives about equally. If the theory that contributions are made in exchange for political favors is correct, then agricultural PACs view senators as having as much power to provide political favors as representatives. If the theory that contributions mainly target access to political influence is correct, then agricultural PACs view senators and representatives about equally in the amount of influence each dollar of contributions is likely to buy. The quantity of influence, in turn, depends on the provision of information to politicians, which politicians perceive as both costly and valuable.

One important difference between contributions to Senate and House candidates is that as a percentage of their total PAC receipts, agricultural PAC contributions to Senate candidates do not exceed 25 percent, and they are generally less

Figure 2.11 Contributions from Agricultural PACs and Ratio of Agricultural PAC Contributions to Total PAC Receipts among Top 20 House Recipients, 1999–2000

Source: Author's calculations.

than 10 percent, even for the largest recipients. This is not surprising, since on average a Senate election costs roughly 10 times as much as a House election.¹³ This spending is depicted in figures 2.10 and 2.11 for the House and in figures 2.17 and 2.18 for the Senate. The fact that agricultural PACs view senators and representatives equally while making campaign contributions appears to be fairly strong evidence that agricultural PACs do not generally seek to influence election outcomes. If influencing elections were the true motive, one would expect contributions for House and Senate candidates to represent roughly the same percentage of total campaign expenses.

Figures 2.12–2.16 list the Senate candidates who were the largest recipients of agricultural PAC money over the five election cycles between 1991 and 2000. It is instructive to compare figure 2.12 with its House counterpart, figure 2.5. On average, the amount of agricultural PAC money received by Senate candidates is of about the same magnitude as that received by House candidates. But there are distinct differences in the characteristics of the top 20 recipients. Many more members of the Agriculture Committee appear on the House list than on the Senate list.¹⁴ Indeed, in the 1993–94 election cycle (figure 2.13), only two of the top

Figure 2.12 Top 20 Senate Recipients of Agriculture PAC Contributions, 1991–92 Election Cycle

Source: Author's calculations.

Note: AC-Agricultural Credit; APSP-Agricultural Production and Stabilization of Prices; ARGL-Agricultural Research and General Liquidation; DFMPP-Domestic and Foreign Marketing and Product Promotion; ID-Idaho; IN-Indiana; ND-North Dakota; NI-Nutrition and Investigations; PA-Pennsylvania; RDRE-Rural Development and Rural Electrification; SC-South Carolina; SD-South Dakota.

20 Senate recipients belonged to the Senate Agriculture, Nutrition, and Forestry Committee. During enactment of the 1995 Farm Bill, the top 20 list included many more senators from the committee (figure 2.14). Nonchalance about committee membership returned in the next two election cycles, with fewer committee members on the top 20 lists of Senate candidates during those cycles (figure 2.15 and 2.16).

The overall message is that membership on the Agriculture, Nutrition, and Forestry Committee did not confer especially great benefits upon senators. This finding accords well with the generally held view that committee membership matters more to House than Senate members. The opportunity for vote trading and logrolling is greater in the Senate than in the House. Regardless of their committee affiliations, senators have greater individual influence over legislation than do representatives, who derive their power from memberships on influential committees. For this reason, the list of the 20 senators receiving the largest

Figure 2.13 Top 20 Senate Recipients of Agriculture PAC Contributions, 1993–94 Election Cycle

Source: Author's calculations.

Note: ARCFGL-Agricultural Research, Conservation, Forestry, and General Liquidation; AZ-Arizona; DE-Delaware; ME-Maine; MS-Mississippi; NE-Nebraska; UT-Utah; VT-Vermont; WY-Wyoming.

contributions from agricultural PACs includes senators from states with influential agricultural constituencies who may or may not be members of the Agriculture, Nutrition, and Forestry Committee.

A case in point is the absence of the chair of this committee in 1991–92, Sen. Patrick Leahy, from Vermont, who ranked 33rd among agricultural PAC recipients, but the presence of senators from Wisconsin, which ranked 8th in 1992 according to market value of agricultural products sold; Missouri, ranked 12th; Arkansas, ranked 13th; Oklahoma, ranked 17th; Pennsylvania, ranked 18th; and Georgia ranked 19th (U.S. Bureau of the Census 1997). Senators on the list who came from states that were not ranked high in terms of the total value of agricultural products ranked high in output of specialized products. Thus senators were sought by potato interests in Idaho, tobacco and livestock interests in Kentucky, peanut and poultry interests in Alabama, and tobacco interests in South Carolina.

Figure 2.14 Top 20 Senate Recipients of Agriculture PAC Contributions, 1995–96 Election Cycle

Source: Author's calculations.

Note: FCRR-Forestry, Conservation, and Rural Revitalization; MIPP-Marketing, Inspection, and Product Promotion; NJ-New Jersey; PPC-Production and Price Competitiveness; RNGL-Research, Nutrition, and General Legislation; TN-Tennessee.

It does not appear that there was a strong desire among senators to become members of agriculture committees—representing a state with strong agriculture interests was sufficient to guarantee them agricultural PAC money. This was especially true among the top 20 recipients in the 1993–94 (figure 2.13), 1997–98 (figure 2.15), and 1999–2000 (figure 2.16) election cycles. Figure 2.13, for example, indicates that agriculturally rich states represented by strong agricultural PACs (California, Montana, Texas, Washington) gave to their Senate candidates regardless of committee membership. The same was true during the 1997–98 and 1999–2000 election cycles. A reasonable conclusion is that there does not appear to be a strong link between the amount of PAC spending and committee membership. Evidence of such a link appears much stronger for House candidates.

Van Doren, Hoag, and Field (1999) do find that committee membership confers benefits on senators. They compute PAC spending by subsector of agriculture between 1989 and 1994 in order to identify which characteristics of senators

Figure 2.15 Top 20 Senate Recipients of Agriculture PAC Contributions, 1997–98 Election Cycle

Source: Author's calculations.

Note: NV-Nevada; NY-New York.

influence the pattern of contributions. They find membership on the Senate Agriculture Committee and the Agriculture, Rural Development, and Related Agencies Subcommittee of the Senate Appropriations Committee to be the most important determinants. Membership on the Senate Agriculture Committee confers the ability to receive \$13,000 more in agricultural PAC contributions; membership on the Appropriations Subcommittee confers an advantage of more than \$4,000. Some agricultural subsectors contribute far more to committee members than others. While the average legislator received only about 7 percent of his or her PAC funding from agricultural PACs, agricultural committee members received almost 14 percent. Of all the subsectors, food manufacturing valued membership to agricultural PACs the most, paying on average \$2,332 a year to committee members. Next in line were sugar cane and sugar beet producer PACs, at \$1,617, followed by agricultural services, at \$1,288. Membership on the Agriculture Appropriations Subcommittee also mattered, leading to an average annual contribution of \$4,215 more than to nonmembers. Agricultural services PACs

Figure 2.16 Top 20 Senate Recipients of Agriculture PAC Contributions, 1999–2000 Election Cycle

Source: Author's calculations.

were the leaders in this category, paying on average \$1,094 more, followed by dairy PACs, at \$891.

Van Doren, Hoag, and Field also find the percentage of the state under farmland to be a consistent indicator of PAC contributions. Holding everything else constant, a 1 percent increase in farmland increased the average contribution to a senator by \$124 a year. Sugar cane and sugar beet (\$27) and tobacco (\$22) were the highest payers. Dairy producers came in third, at \$18.

While their estimates are statistically significant, the effects are small relative to the total campaign contribution these committee members receive. The lobbying data analyzed here suggest that a similar exercise for House Agriculture Committee members would show committee effects that are not only statistically significant but also economically large.

It is pertinent to ask whether informational lobbying might not be a useful alternative to the quid pro quo lobbying of the Grossman-Helpman model. It has been well documented (in Parker and Parker 1998, for example) that members of Congress interact continually with lobbyists on agricultural issues.

Figure 2.17 Agriculture PAC Contributions as a Percentage of Total PAC Receipts among Top 20 Senate Agriculture PAC Recipients, 1991–92

Source: Author's calculations.

Figure 2.18 Agriculture PAC Contributions as a Percentage of Total PAC Receipts among Top 20 Senate Agriculture PAC Recipients, 1999–2000

Source: Author's calculations.

Members of Congress have full knowledge about their constituents' preferences, which is why they seek out memberships on agriculture committees. There is little, if any, new information that they seek from lobbies in order to raise their reelection chances, and there is little, if any, new information that agriculture lobbies possess. At least in the agriculture case, then, there appears to be no role for informational lobbying. This conclusion is in contrast to that of Hansen (1991), who does find an important role for informational lobbying. He considers a longer period in history, during which there were points in time when Congress sought new information from lobbies. At those threshold points, informational lobbying may have led to marked shifts in how Congress began to view agricultural policy. Over the 1991–2000 period, however, informational lobbying does not appear to have played a role.

In the empirical section, a reduced-form approach is used to explore the association between lobbying spending and agricultural protection. This is the first evidence of such an association in this sector, and the nature of the exercise and the evidence is exploratory. The main message is that there is a strong association between lobbying spending and protection. Whether the association is through informational channels or whether lobbying is payment for services are questions that are not directly addressed, for they require more theory-based investigation. Gawande and Hoekman (2005) undertake one such examination of the quid pro quo hypothesis. Perhaps other second-generation studies will use more formal structural models to investigate the relative importance of informational and quid pro quo lobbying in the context of U.S. agricultural policy.

2.3 Econometric Evidence

Econometric evidence on the association between lobbying spending and protection in agriculture is presented in this section, using panel data for 44 commodities for 1985–2001.¹⁵ There is considerable time-series as well as cross-sectional variation in the data. Lobbying data were constructed from Federal Election Commission databases for each election cycle between 1991 and 2000.¹⁶ Goods are ordered by the PAC spending to production ratio.¹⁷ Agricultural protection is measured primarily as nontariff measure coverage ratios.¹⁸ Data on the incidence of these measures are from the UNCTAD Trade Analysis and Information System (TRAINS) database for 1993–96 and 1999.¹⁹ This database documents more than 150 types of nontariff measures. The measure used here is the coverage ratio of the union of all nontariff measures. Although this measure aggregates price-type, quantity-type, and investigations-type nontariff measures, each with different price effects, it has nevertheless been used in other studies of the political economy of trade protection (see, for example, Gawande and Bandyopadhyay 2000;

Goldberg and Maggi 1999). The TRAINS database also includes narrower nontariff measure classifications, such as nontariff price measures, nontariff threat measures, countervailing duties, quality monitoring, and specific tariffs. Separate analyses of these nontariff measures are undertaken and reported.

Hoekman, Ng, and Olarreaga (2004) have compiled data on the ad valorem equivalent of specific tariffs applied by the United States on agricultural imports from the European Union on a set of agricultural commodities that also enjoy export subsidies in the United States. Whether these measures of protection are also associated with lobbying spending is investigated empirically.

Since nontariff measure data are at the Harmonized System (HS) six-digit level, they are readily merged with the trade and production data. The sample includes commodities that accounted for about 30 percent of total agricultural imports and 45 percent of total agricultural output in 1998.

Results

Table 2.3 presents ordinary least squares estimates from a simple linear model with three explanatory variables plus a constant term. The explanatory variables are the import-output ratio (M/Y), the export-output ratio (X/Y), and a measure of lobbying. Two measures of lobbying, %PACEXP and RANKPACEXP, were constructed for each cross-sectional sample. The first, %PACEXP, represents PAC spending as a fraction of total PAC spending in the sample under consideration. The second, RANKPACEXP, represents the rank of PAC spending (a high rank implies high PAC spending), scaled by sample size N . RANKPACEXP varies between $1/N$ and 1 and increases monotonically with PAC spending. It is less influenced by large values of PAC spending than %PACEXP, so the estimated coefficients indicate robustness to these lobbying measures.

Six regression models are estimated, two each for 1993, 1996, and 1999. For 1993 the two models have M/Y and X/Y in common but include either %PACEXP or RANKPACEXP. The idea behind estimating the simple model is to discover whether lobbying affects nontariff barrier protection of agriculture.

The model estimates in the top panel of table 2.3 clearly indicate that lobbying significantly influences the overall nontariff measure coverage ratio. The bottom two panels indicate that price nontariff measures (PRICE), which represents a substantial part of the overall nontariff measure coverage, might be driving the nontariff measure results. Nontariff threat measures (THREAT) produce conflicting results on the influence of lobbying.

The quantitative implications of the estimates indicate a sizable correlation between lobbying and nontariff barrier measures. In 1993, for example, the coefficient of 2.694 indicates that for every 1 percentage point increase in %PACEXP, the nontariff measure coverage rises by 2.7 percent. This is both an

TABLE 2.3 Agricultural Trade Protection Regressions—NTM I

Year	Dep. var.	Constant	M/Y	X/Y
1993	NTM	est 0.212	0.009	−0.270
		<i>t</i> 1.981	0.599	−0.724
1993	NTM	est −0.084	0.013	−0.344
		<i>t</i> −0.518	0.932	−0.961
1996	NTM	est 0.953	0.024	−0.445
		<i>t</i> <u>12.226</u>	1.613	<u>−2.034</u>
1996	NTM	est 0.756	0.026	−0.468
		<i>t</i> <u>6.538</u>	1.914	<u>−2.329</u>
1999	NTM	est 0.884	0.008	−0.265
		<i>t</i> <u>9.436</u>	0.395	−0.620
1999	NTM	est 0.848	0.010	−0.303
		<i>t</i> <u>6.443</u>	0.498	−0.725
1993	PRICE	est 0.092	−0.001	0.006
		<i>t</i> 0.936	−0.089	0.018
1993	PRICE	est −0.130	0.003	−0.063
		<i>t</i> −0.852	0.193	−0.186
1996	PRICE	est 0.000	0.000	0.000
		<i>t</i> <u>−2.327</u>	0.048	0.018
1996	PRICE	est 0.000	0.000	−0.001
		<i>t</i> −0.671	0.773	−0.770
1999	PRICE	est 0.000	0.000	0.000
		<i>t</i> <u>−1.903</u>	0.044	−0.004
1999	PRICE	est 0.000	0.000	−0.001
		<i>t</i> −0.502	0.939	−0.936
1993	THREAT	est 0.015	0.004	−0.093
		<i>t</i> 0.276	0.466	−0.487
1993	THREAT	est −0.019	0.008	−0.197
		<i>t</i> −0.183	0.848	−0.858
1996	THREAT	est 0.993	0.023	−0.446
		<i>t</i> <u>12.014</u>	1.510	<u>−1.921</u>
1996	THREAT	est 0.801	0.020	−0.379
		<i>t</i> <u>5.732</u>	1.214	−1.559
1999	THREAT	est 0.938	0.008	−0.264
		<i>t</i> <u>9.527</u>	0.363	−0.589
1999	THREAT	est 0.878	0.001	−0.125
		<i>t</i> <u>6.121</u>	0.064	−0.274

TABLE 2.3 (Continued)

%PACEXP	RANKPACEXP	N	R ²	Adj. R ²
2.694		31	0.267	0.185
<u>2.782</u>				
	0.754	31	0.312	0.236
	<u>3.167</u>			
0.425		33	0.292	0.219
0.515				
	0.408	33	0.391	0.328
	<u>2.239</u>			
0.644		38	0.161	0.087
0.463				
	0.114	38	0.164	0.090
	0.568			
2.264		31	0.206	0.118
<u>2.553</u>				
	0.586	31	0.214	0.126
	<u>2.615</u>			
0.018		33	0.845	0.829
<u>12.444</u>				
	0.001	33	0.107	0.014
	1.695			
0.023		38	0.611	0.577
<u>7.169</u>				
	0.001	38	0.100	0.021
	1.698			
1.989		31	0.397	0.330
<u>4.012</u>				
	0.226	31	0.109	0.010
	1.478			
-1.872		33	0.312	0.241
<u>-2.138</u>				
	0.229	33	0.232	0.152
	1.040			
-2.335		38	0.182	0.110
-1.599				
	-0.041	38	0.121	0.044
	-0.188			

Source: Ordinary least squares (OLS) estimates. Sample is cross-section of five-digit Harmonized System (HS) code for agricultural products for 93, 96, 99. NTM data (from TRAINS database) available for those years.

Note: NTM = Coverage of imports with some Price-type (PRICE), Quant-type or Threat NTM (THREAT); **Bold** and underline implies that corresponding estimate is statistical significance at 5%; **bold** implies that corresponding estimate is statistical significance at 10%; %PACEXP = PAC spending as a fraction of total PAC spending for the cross-section. RANKPACEXP = ranking by PAC spending (high rank implies relatively high PAC spending) scaled by sample size (N is the highest rank). So $1 \geq \text{RANKPACEXP} \geq 0$ and monotonically increases with PAC spending.

TABLE 2.4 Agricultural Trade Protection Regressions—NTM II

Year	Dep. var.	Constant	M/Y	X/Y
1993	CVD	est -0.038	-0.007	0.191
		<i>t</i> -0.691	-0.987	0.997
1993	CVD	est -0.048	-0.003	0.080
		<i>t</i> -0.451	-0.341	0.341
1996	CVD	est -0.028	-0.008	0.117
		<i>t</i> -0.605	-0.881	0.885
1996	CVD	est -0.050	-0.002	0.031
		<i>t</i> -0.530	-0.200	0.193
1999	CVD	est -0.064	-0.015	0.320
		<i>t</i> -1.248	-1.352	1.362
1999	CVD	est -0.040	-0.007	0.154
		<i>t</i> -0.481	-0.582	0.577
1993	QUAL	est 0.064	0.008	-0.225
		<i>t</i> 1.049	0.992	-1.054
1993	QUAL	est -0.004	0.014	-0.362
		<i>t</i> -0.033	1.296	-1.326
1996	QUAL	est -0.006	0.000	-0.004
		<i>t</i> -0.123	0.018	-0.029
1996	QUAL	est -0.136	0.009	-0.135
		<i>t</i> -1.321	0.761	-0.756
1999	QUAL	est -0.022	-0.006	0.122
		<i>t</i> -0.318	-0.386	0.383
1999	QUAL	est -0.132	0.006	-0.135
		<i>t</i> -1.233	0.400	-0.397

economically and statistically significant result. The estimated coefficient of 0.754 on RANKPACEXP in the second nontariff measure model shows that the 1993 results are robust to the two lobbying measures. The 1996 and 1999 nontariff measure results are not as robust. The coefficients in 1996 indicate an association between lobbying and nontariff measures, but the other coefficients are not statistically significant.

Surprisingly, the coefficients on M/Y and X/Y are not statistically significant in most nontariff measure models for the three years. The exceptions are 1996, when an increase in the export-output ratio is associated with a lower nontariff measure, as one would intuitively expect in industries in which intraindustry trade is driven by intermediate goods trade. The import-output ratio is borderline

TABLE 2.4 (Continued)

%PACEXP	RANKPACEXP	N	R ²	Adj. R ²
1.997 <u>4.026</u>		31	0.378	0.309
	0.183 1.180	31	0.054	-0.052
2.155 <u>4.331</u>		33	0.395	0.333
	0.201 1.360	33	0.064	-0.033
2.778 <u>3.634</u>		38	0.288	0.225
	0.140 1.096	38	0.045	-0.039
2.728 <u>4.930</u>		31	0.514	0.460
	0.348 1.917	31	0.187	0.096
3.231 <u>6.490</u>		33	0.599	0.558
	0.489 <u>3.020</u>	33	0.252	0.175
4.294 <u>4.141</u>		38	0.340	0.282
	0.498 <u>3.062</u>	38	0.222	0.153

Source: Author's calculations.

Note: See note to table 2.3; CVD = countervailing duties, QUAL = quality monitoring.

statistically significant for the 1996 models, but it is not significant in the nontariff measure models for other years.

The second panel in table 2.3 displays estimates from the price nontariff measure models for the three years. The association of lobbying spending with PRICE (for example, antidumping duties, countervailing duties, and other price-oriented nontariff measures) is significant. However, the coefficients fluctuate considerably across the three years. For example, %PACEXP has a coefficient of 2.264 for 1993, but it drops to 0.018 in 1996 and to 0.023 in 1999. However, the coefficients retain their statistical significance. This points to the possibility that one or two large

TABLE 2.5 Agricultural Trade Protection Regressions—Specific Tariffs

Year	Dep. var.	Constant	M/Y	X/Y
1993	SPECT	est 0.232 <i>t</i> <u>2.058</u>	−0.046 <u>−2.978</u>	1.281 <u>3.258</u>
1993	SPECT	est 0.049 <i>t</i> 0.285	−0.044 <u>−2.913</u>	1.246 <u>3.259</u>
1996	SPECT	est 0.261 <i>t</i> <u>2.820</u>	−0.006 −0.354	0.144 0.553
1996	SPECT	est 0.064 <i>t</i> 0.428	0.001 0.085	0.036 0.140
1999	SPECT	est 0.242 <i>t</i> <u>2.248</u>	−0.015 −0.669	0.387 0.789
1999	SPECT	est 0.083 <i>t</i> 0.557	−0.006 −0.271	0.194 0.409

values of %PACEXP are determining the regression (this would also explain why the fit for those years is abnormally good). Although RANKPACEXP is less susceptible to influential data points, it produces the same inference—that lobbying is strongly associated with the imposition of nontariff price measures. The drop in the estimates from 1993 is also indicative of the fact that nontariff price measures dropped over this period as a result of the Uruguay Round.

The third panel reports estimates from nontariff threat models for the three years. Whereas in 1993 lobbying was associated with THREAT, there was no association in the other years. Apparently, THREAT was lowered considerably after the inception of the Uruguay Round.

CVD and QUAL did not decline in frequency or intensity after the inception of the Uruguay Round. The top panel of table 2.4 indicates that %PACEXP is strongly associated with the imposition of countervailing duties (CVDs) in all three years. However, the coefficient on RANKPACEXP is statistically insignificant, indicating the possibility of influential %PACEXP values. The bottom panel of table 2.4 indicates that QUAL is significantly associated with lobbying spending and is robust across the two measures of lobbying. The size of the coefficients on %PACEXP and RANKPACEXP also indicates that QUAL does not appear to have declined after the Uruguay Round.

Similar inferences may be drawn about specific tariffs (SPECT) from the estimates reported in table 2.5. SPECT is associated with lobbying spending for both %PACEXP and RANKPACEXP (except in 1993, when the coefficient on %PACEXP is borderline significant). Curiously, in the 1993 models of SPECT,

TABLE 2.5 (Continued)

%PACEXP	RANKPACEXP	N	R ²	Adj. R ²
1.488		31	0.311	0.234
1.460				
	0.450	31	0.334	0.260
	1.769			
2.564		33	0.218	0.137
<u>2.621</u>				
	0.567	33	0.192	0.109
	<u>2.393</u>			
3.227		38	0.136	0.060
<u>2.021</u>				
	0.521	38	0.162	0.088
	<u>2.298</u>			

Source: Author's calculations.

Note: 1. See note to table 2.3; 2. SPECT = specific tariff.

M/Y and X/Y have signs that are contrary to expectation. X/Y has a positive coefficient, implying that the higher the export-output ratio, the higher the specific tariff on that product. It is likely that tariffs are protecting imports of similar products and thus promoting exports of those products. This is an instance of tariffs as export promotion, an idea set forth by Krugman (1984).

Table 2.6 uses data on agricultural tariffs on imports from the European Union for goods that also benefited from export subsidies in the United States. The data are from Hoekman, Ng, and Olarreaga (2004).²⁰ It models the average U.S. tariff during 1995–98 on products that also benefited from a U.S. export subsidy. The extra variable that appears in these models is the corresponding EU average tariff (AVGEU15). That variable is included in order to examine whether U.S. tariffs retaliate against EU tariffs for these goods. The clearest inference from table 2.4 is that lobbying spending, measured by %PACEXP or RANKPACEXP, is powerfully associated with the imposition of U.S. tariffs on products whose exports are subsidized in the United States. This finding is robust for each of the four years 1995–98.

Table 2.7 estimates the same set of models, but the dependent variable now is the maximum U.S. tariff over 1995–98 for each of these products in the sample. The estimates from the models affirm the earlier findings, implying that the results are robust to modeling the average U.S. tariff or the maximum U.S. tariff on these products.

TABLE 2.6 Determinants of Agricultural Tariffs (Including Specific Tariffs) on Products with Export Subsidies
Dependent Variable: Average Tariff between 1995 and 1998

Year	Dep. var.	Constant	M/Y	X/Y
1995	AvgUS	est 0.008	−0.009	0.088
		<i>t</i> 0.279	1.166	1.144
1995	AvgUS	est −0.025	−0.005	0.056
		<i>t</i> 0.541	0.620	0.609
1996	AvgUS	est 0.052	−0.005	0.062
		<i>t</i> <u>2.126</u>	0.914	0.837
1996	AvgUS	est −0.047	−0.005	0.076
		<i>t</i> 1.137	0.990	0.989
1997	AvgUS	est 0.045	−0.005	0.074
		<i>t</i> 1.760	0.933	0.875
1997	AvgUS	est −0.038	−0.006	0.105
		<i>t</i> 0.859	1.188	1.182
1998	AvgUS	est 0.030	−0.011	0.201
		<i>t</i> 1.240	1.692	1.650
1998	AvgUS	est −0.044	−0.011	0.210
		<i>t</i> 1.147	1.682	1.683

TABLE 2.7 Determinants of Agricultural Tariffs (Including Specific Tariffs) on Products with Export Subsidies
Dependent Variable: Maximum Tariff between 1995 and 1998

Year	Dep. var.	Constant	M/Y	X/Y
1995	MaxRateUS	est 0.022	−0.010	0.101
		<i>t</i> 0.505	0.960	0.934
1995	MaxRateUS	est −0.036	−0.008	0.077
		<i>t</i> 0.550	0.629	0.611
1996	MaxRateUS	est 0.077	−0.006	0.084
		<i>t</i> <u>2.220</u>	0.878	0.796
1996	MaxRateUS	est −0.083	−0.006	0.098
		<i>t</i> 1.384	0.887	0.891
1997	MaxRateUS	est 0.068	−0.007	0.112
		<i>t</i> 1.792	0.934	0.872
1997	MaxRateUS	est −0.072	−0.010	0.157
		<i>t</i> 1.096	1.195	1.192
1998	MaxRateUS	est 0.044	−0.017	0.315
		<i>t</i> 1.213	1.775	1.731
1998	MaxRateUS	est −0.077	−0.016	0.307
		<i>t</i> 1.345	1.648	1.652

TABLE 2.6 (Continued)

AvgEU15	%PACEXP	RANKPACEXP	N	R ²	Adj. R ²
0.114	0.905		24	0.513	0.410
0.366	<u>4.091</u>				
−0.323		0.187	24	0.321	0.178
0.889		<u>2.574</u>			
−0.443	1.067		26	0.416	0.304
<u>2.486</u>	<u>3.667</u>				
−0.193		0.226	26	0.375	0.256
1.273		<u>3.349</u>			
−0.373	1.094		28	0.314	0.194
<u>2.026</u>	<u>3.082</u>				
−0.158		0.195	28	0.275	0.149
0.998		<u>2.788</u>			
−0.394	1.104		30	0.370	0.270
<u>2.312</u>	<u>3.234</u>				
−0.169		0.182	30	0.337	0.231
1.153		<u>2.949</u>			

Source: Author's calculations.

TABLE 2.7 (Continued)

AvgEU15	%PACEXP	RANKPACEXP	N	R ²	Adj. R ²
−0.002	1.358		24	0.537	0.439
0.005	<u>4.256</u>				
−0.536		0.302	24	0.382	0.252
1.426		<u>2.968</u>			
−0.507	1.785		26	0.464	0.362
<u>3.186</u>	<u>4.089</u>				
−0.239		0.370	26	0.428	0.319
<u>1.837</u>		<u>3.782</u>			
−0.442	1.832		28	0.339	0.224
<u>2.551</u>	<u>3.272</u>				
−0.218		0.332	28	0.329	0.212
1.550		<u>3.190</u>			
−0.468	1.860		30	0.399	0.303
<u>2.946</u>	<u>3.527</u>				
−0.224		0.302	30	0.374	0.274
<u>1.717</u>		<u>3.304</u>			

Source: Author's calculations.

Interestingly, tariffs in 1996, 1997, and 1998 appear to have been deterred by EU tariffs on these products. The coefficient in table 2.6 on AVGEU15 is -0.443 for 1996 in the model with %PACEXP included, indicating that a higher EU average tariff deterred the average U.S. tariff. This somewhat surprising finding is not robust across the two models for each year. With RANKPACEXP included, the coefficient on AVGEU15 becomes statistically insignificant. It is possible that the most influential %PACEXP values are correlated with influential AVGEU15 values. When influential values receive less weight (as happens when RANKPACEXP is included), the correlation between the lobbying variable and AVGEU15 declines and the results on AVGEU15 become statistically insignificant. In sum, the coefficient on retaliation or deterrents is not robust across the years or models estimated. This lack of robustness holds true for the maximum U.S. tariff as well.

The econometric estimates point to two fairly strong associations from U.S. data from the 1990s across agricultural products and one surprising lack of association. The first strong association is that between lobbying spending by agricultural PACs and measures of nontariff barriers. This association is robust across aggregate nontariff measures as well as nontariff measures disaggregated by type. While there is no evidence of such an association with ad valorem tariffs, probably because they have been multilaterally lowered, lobbying is still associated with specific tariffs.

The second strong association is between lobbying spending and the average U.S. tariff over the 1995–98 period on goods that also enjoyed an export subsidy in the United States. The surprising lack of association is between agricultural protection, however it is defined, and trade measures such as import penetration and the export to output ratio. The surprise is that it is not these variables, often the key variables in empirical investigations of the political economy of protection, but rather direct measures of pressure, such as lobbying spending, that are strongly associated with agricultural protection.

The econometric model used here is not the appropriate vehicle to determine whether lobbying is payment for services or whether it influences protection by providing legislators with information. But the analysis of the data and the survey of the literature suggest that lobbying in agriculture may represent payment for services rather than purely informational lobbying. More theory-based estimation will be required before such a claim can be made conclusively.

2.4 Concluding Remarks

The chapter has analyzed the structure of lobbying by agricultural PACs over the 1991–2000 period. A detailed analysis of campaign contributions by agricultural PACs indicates the following:

- While many PACs exist, in most sectors the majority of contributions are made by a very small number of PACs—that is, giving by PACs is highly concentrated.

- PAC contributions seem to be made with a view to gaining access to politicians, but PACs respond by contributing more when such contributions may influence election outcomes.
- The top 20 recipients among House candidates often consist of members of the House Agriculture Committee.
- The top 20 recipients among Senate candidates include fewer members of committees that are connected to agricultural policy.
- The top House recipients of agricultural PAC money receive a significant portion of their total PAC receipts from agricultural PACs, which is probably one reason why they vie for positions on the Agriculture Committee.
- The top Senate and House candidates receive about equal amounts from agricultural PACs.

In sum, PACs seem to be quite effective in influencing agriculture policy in the United States.

A reduced-form econometric model of agricultural protection provides clear evidence of a strong association between lobbying and protection. That evidence appears to demonstrate that PAC money wields a strong influence over agricultural protection. Whether it is PAC money that is influential or whether PAC money primarily allows access to politicians so that PACs can then influence policy by supplying (costly) information that politicians find valuable in enhancing their future election chances remains an open question worthy of further study. It is hoped that this study encourages more structural econometric evidence on the relative importance of the two channels of influence.

Notes

1. The quantity of assistance may be measured by the nominal protection coefficient, which measures the difference between world and domestic prices as a result of the price support; by the effective protection coefficient, which measures the amount by which the policy raises value-added; or by the producer consumer subsidy equivalent, which measures the monetary benefit to producers and consumers as a result of the policy as a percentage of production value in the absence of the subsidy.

2. This finding about Ways and Means is at odds with Wright's findings from his survey of lobbies.

3. The individual welfare functions are made up of three components: producer profits, consumer surplus, and tariff revenue. Since individuals maximize quasi-linear utility functions with desirable properties, the expression for consumer surplus is simple. See equation (4) in Grossman and Helpman (1994).

4. The Ramsey pricing logic applies here. The Ramsey tax formula implies that if the demand for a good is uniformly less elastic than demand for another good, the optimal tax rate is higher for the first good, because of the lower deadweight loss from taxing it rather than the second good. If the first good is totally inelastic, there is no deadweight loss from taxing it, and the first-best solution can be reached by taxing only this good.

5. As in the Grossman-Helpman model, deadweight loss has no normative implications given the objective function; it represents the real resource cost of redistributive services.

6. While the three sets of models described emphasize varying degrees of pressure by farm interest groups, Paarlberg (1989) believes they do not provide a complete understanding of U.S. agricultural

policy. What these theories miss, according to Paarlberg, is the government's concern for poor economic conditions in the sector. Such concerns motivated President Roosevelt's introduction of price support programs in the Agricultural Adjustment Act of 1933, supports that are integral to U.S. agricultural policy to this day.

7. The author is grateful to Chris Magee for making these data available.

8. Agriculture-related nonfarm PACs contributed \$9–\$10 million per cycle during this period. PACS representing the food manufacturing, forestry/nursery, agriculture services, and distribution sectors were even more active in absolute terms than farm PACs.

9. Food manufacturing and forestry/nursery had a lower degree of concentration; crop processing had the highest degree of concentration (Cargill Inc. represents this industry almost single-handedly.)

10. Agricultural PACs are defined as those related to all the agriculture-related sectors shown in figure 2.2. They include farm products, ranch products, agriculture services, crop processing, distribution, forestry/nursery, and farm equipment and manufacturing.

11. During 1991–92, the House Agriculture Subcommittees were Conservation, Credit, and Rural Development; Cotton, Rice, and Sugar; Department Operations, Research, and Foreign Agriculture; Domestic Marketing, Consumer Relations, and Nutrition; Forest, Family Farms, and Energy; Livestock, Dairy, and Poultry; Peanuts and Tobacco; and Wheat, Soybeans, and Feed Grains. The 1993–94 subcommittees were Department Operations and Nutrition; Environment, Credit, and Rural Development; Foreign Agriculture and Hunger; General Farm Commodities; Livestock; and Specialty Crops and Natural Resources. House subcommittees in 1995–96 and 1997–98 were Department Operations, Nutrition, and Foreign Agriculture; Livestock, Dairy, and Poultry; Risk Management and Specialty Crops; and Resource Conservation, Research, and Forestry. In 1999–2000 the subcommittees were Department Operations, Oversight, Nutrition, and Forestry; General Farm Commodities, Resource Conservation, and Credit; Livestock and Horticulture; and Risk Management, Research, and Specialty Crops.

12. Total receipts were generally higher, because the candidates received contributions not only from PACs but also from individuals.

13. In 1992 the average winning Senate candidate spent \$3.9 million while the average House winning candidate spent \$0.5 million, a ratio of about 8:1. The average Senate loser spent \$2.0 million while the average House loser spent \$0.2 million, a ratio of 10:1. In other election cycles, the average Senate to House spending ratios (winners plus losers) were 10:1 in 1994, 8:1 in 1996, 9.4:1 in 1998, 10:1 in 2000. Total PAC receipts as a proportion of total campaign spending averaged about 20 percent for winning Senate candidates and about 50 percent for winning House candidates (<http://www.opensecrets.org>).

14. The Senate Agriculture, Nutrition, and Forestry Committee is smaller than the House Agriculture Committee. In 1991–92 it included 18 senators (10 Democrats and 8 Republicans), about two-fifths the size of the House Agriculture Committee. During 1991–92 the following subcommittees were formed: Conservation, Credit, and Rural Development; Cotton, Rice, and Sugar; Department Operations, Research, and Foreign Agriculture; Domestic Marketing, Consumer Relations, and Nutrition; Forests, Family Farms, and Energy; Livestock, Dairy, and Poultry; Peanuts and Tobacco; and Wheat, Soybeans, and Feed Grains. At the beginning of every new Congress the entire subcommittee structure is significantly altered. In 1993–94 the subcommittees were Agricultural Credit; Agricultural Production and Stabilization of Prices; Agricultural Research, Conservation, Forestry, and General Liquidation; Domestic and Foreign Marketing and Product Promotion; Nutrition and Investigations; and Rural Development and Rural Electrification. The subcommittees in 1995–96, 1997–98, and 1999–2000 were Forestry, Conservation, and Rural Revitalization; Marketing, Inspection, and Product Promotion; Production and Price Competitiveness; and Research, Nutrition, and General Legislation.

15. The online Production, Supply, and Distribution Database of the U.S. Department of Agriculture (USDA) (<http://www.ers.usda.gov>) was the source for the trade and production data used to construct the import penetration ratio. Time series data for 1985–2001 for farm products at the four- and five-digit HS level are available at the site. The USDA system is not kept at the HS level; coding into the HS was done manually from descriptions. The descriptions fit the four- or five-digit HS descriptions almost perfectly.

16. Numerous checks were applied to the lobbying data. For example, the data are close to the numbers reported at <http://www.opensecrets.org>. A detailed data appendix describing the construction of the PAC data is available from the author.

17. Production value is not immediately available, since the production, supply, and distribution database keeps data in quantities, not values, and units of measurement are disparate across goods. But imports can be recovered by dividing the import-to-output ratio by imports (from UNCTAD) in order to recover the value of production. Where imports are zero, this method does not allow production to be measured, and those observations have to be dropped. Fortunately, imports are zero for only few goods.

18. Agricultural protection may be measured using ad valorem tariffs as well. Model 3 was also estimated using four measures of tariffs. Three of these measures are from the UNCTAD TRAINS database at the six-digit HS levels for 1993, 1996, and 1999. They are an ad valorem measure, a specific tariff measure, and a tariff coverage measure. The fourth measure is an ad valorem tariff measure from the International Trade Commission database at the eight-digit HS level for 1997–2001. Import-weighted averages of these tariffs were used to concord to the four- and five-digit HS level at which the analysis is conducted. While specific tariffs are well explained by the model and reported in the tables, the ad valorem tariff data are not well explained by the variables included. This is probably because tariffs have been determined multilaterally and are not appropriate for testing models of unilateral protection. The tariff results are available from the author.

19. From the raw data on the UNCTAD TRAINS database, Haveman constructed binary indicators of nontariff measures at the six-digit HS level. Those measures are used here. Some problems in the TRAINS database have been corrected in more recent versions, but recent versions do not have historical data on nontariff measures.

20. The author is grateful to Francis Ng for providing the data and its documentation.

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FORMULA APPROACHES TO LIBERALIZING TRADE IN GOODS: EFFICIENCY AND MARKET ACCESS CONSIDERATIONS

Joseph Francois, Will Martin, and Vlad Manole

There are wide differences in the broad approaches to tariff reduction initially proposed as part of the Doha Development Agenda. In agricultural negotiations the European Union, Japan, and Switzerland favor the Uruguay Round approach to tariff reduction, while Cairns Group members and the United States favor the more top-down Swiss formula (WTO 2003b).

In the negotiations on nonagricultural market access, the draft declaration for the ill-fated Cancun Ministerial Meeting moved away from earlier proposals involving a Swiss formula for nonagricultural market access, instead calling for delegates to seek a “nonlinear” tariff reduction formula (WTO 2003a). There seems to be broad agreement in the Doha Development Agenda negotiations on the desirability of a formula-based approach to tariff reductions, and many different formulas have been proposed. Some of these formulas—such as the Uruguay Round approach to agricultural tariff reduction—allow discretion in assigning tariff cuts at the tariff-line level. Others are specified on a line-by-line basis, removing policy makers’ discretion at the product level.

A major difficulty in comparing the different formulas under consideration is that they differ in many key respects, including the extent to which they reduce

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average tariffs and the extent to which they reduce higher tariffs by more than lower ones (top-down). The objective of this chapter is to provide a framework for evaluating the trade-offs between approaches such as the Swiss formula, which are sharply top-down, and approaches such as the proportional cuts approach, which are less targeted to reducing peak tariffs. The focus is on trade in goods only; given the absence of tariffs on trade in services, negotiations to reduce barriers to trade cannot use the type of formulas considered here.¹

The potential benefits from using a formula approach are large. If a suitable top-down formula can be identified and implemented, it will almost certainly lead to a global welfare gain, since the social costs of tariffs generally rise more rapidly than the rates themselves (Vousden 1990).² By contrast, approaches that focus on reducing relatively low, “nuisance” tariffs face the risk of reducing economic welfare and tariff revenues by diverting imports away from higher tariff items.

An important message from analysis of actual tariff data appears to be that the critical feature of a formula approach for welfare in the importing countries is not so much the flexibility of the formula (that is, its willingness to go soft on peak tariffs) but rather the specification of a targeted reduction in the average rate. In other words, as long as a reduction in the average is still met, introducing some added flexibility by moving closer to proportional tariff cuts may not greatly reduce the importing country’s gains from a top-down approach. However, moving away from a strict top-down approach in the industrial countries does seem to reduce the market access gains for low-income countries in industrial country markets.

This chapter is organized as follows. Section 3.1 surveys the current market access landscape. It highlights important issues related to tariff peaks, unbound tariffs, and gaps between bound and applied rates that are important determinants of success for any formula approach. Section 3.2 considers some formula-based approaches. Section 3.3 sets out the concept of “flexible formula” approaches. Section 3.4 considers some practical implementation issues. For illustration, and to assess the quantitative implications of alternative formulas, section 3.5 examines an initial sample of three industrial countries and three developing countries. Section 3.6 considers the trade-offs between increasing flexibility and two dimensions of the cost of doing so—reductions in efficiency in the importing country and reductions in cuts in average tariffs facing developing countries.

3.1 A Quick Tour of the Market Access Landscape

Tariff negotiations in the multilateral trading system have generally been based on tariff bindings, or schedules of concessions tabled under GATT (General Agreement on Tariffs and Trade) rules; the coverage and level of these bindings are important initial conditions for negotiation. Table 3.1 shows the share of industrial product

TABLE 3.1 Industrial Tariff Rates and Bindings Post-Uruguay Round and International Technology Agreement

Country	Percentage of most favored nation (MFN) imports that are subject to				Tariff lines	
	Bound tariffs	Unbound tariffs	Tariffs bound above applied rates	Tariffs unbound or bound above applied rates	Bound duty-free tariff line/total tariff lines	Total tariff lines
Argentina	100.0	0.0	99.9	99.9	0.0	10,530
Australia	96.9	3.1	31.7	34.8	17.7	5,520
Brazil	100.0	0.0	91.0	91.0	0.5	10,860
Canada	99.8	0.2	45.7	45.9	34.5	6,261
Chile	100.0	0.0	99.7	99.7	0.0	5,055
Colombia	100.0	0.0	97.7	97.7	0.0	6,145
El Salvador	97.1	2.9	96.0	98.9	0.0	4,922
European Union	100.0	0.0	17.7	17.7	26.9	7,635
Hungary	93.6	6.4	3.3	9.7	10.4	5,896
India	69.3	30.7	14.8	45.5	0.0	4,354
Indonesia	92.3	7.7	86.6	94.3	0.0	7,735
Japan	95.9	4.1	0.1	4.2	47.4	7,339
Korea, Rep. of	89.8	10.2	3.4	13.6	11.6	8,882
Malaysia	79.3	20.7	31.0	51.7	1.6	10,832
Mexico	100.0	0.0	98.4	98.4	0.0	11,255
New Zealand	100.0	0.0	46.5	46.5	39.5	5,894
Norway	100.0	0.0	36.5	36.5	46.6	5,326
Peru	100.0	0.0	98.5	98.5	0.0	4,545
Philippines	67.4	32.6	15.5	48.1	0.0	5,387
Poland	92.8	7.2	44.6	51.8	2.2	4,354
Singapore	36.5	63.5	11.7	75.2	15.2	4,963
Sri Lanka	9.2	90.8	1.4	92.2	0.1	5,933
Thailand	67.4	32.6	8.9	41.5	0.0	5,244
Tunisia	67.9	32.1	41.5	73.6	0.0	5,087
Turkey	49.3	50.7	0.0	50.7	1.4	15,479
United States	100.0	0.0	14.0	14.0	39.4	7,872
Uruguay	100.0	0.0	96.3	96.3	0.0	10,530
Venezuela, R. B. de	100.0	0.0	90.3	90.3	0.0	5,974
Zimbabwe	13.6	86.4	3.9	90.3	3.0	1,929

Source: Francois (2001), based on World Trade Organization (WTO) and World Bank data on Uruguay Round and post-International Technology Agreement (ITA) schedules.

**TABLE 3.2 Effects of Basic Swiss Formula Reductions
(Applied Tariffs Before and After a 50 Percent
Cut in Average Tariff Bindings)**

Type of tariff/country	Post-Uruguay Round and ITA tariffs			
	Simple average	Standard deviation	Maximum tariff	Binding overhang
Agriculture				
European Union	5.9	7.5	74.9	0.3
Japan	6.2	8.1	43.3	1.2
United States	3.5	7.4	90.0	0.5
Brazil	12.9	5.1	27.0	22.6
India	31.0	20.8	150.0	90.7
Thailand	26.5	14.4	65.0	7.1
Nonagriculture				
European Union	3.7	3.6	17.0	0.4
Japan	2.3	3.4	30.9	0.1
United States	3.2	4.3	37.5	0.2
Brazil	15.9	6.0	35.0	14.9
India	19.2	16.5	40.0	3.9
Thailand	10.5	10.8	80.0	7.8

tariffs (on a trade-weighted basis) that remains either unbound or bound above applied rates. While tariffs in the Organisation for Economic Co-operation and Development (OECD) (and Latin America) are generally bound, many tariffs in Africa and Asia remain unbound, despite more than a fourfold increase in the coverage of developing-country tariff bindings in the Uruguay Round (Abreu 1996). For almost all developing countries, existing bindings are, on average, well above applied rates, reflecting a combination of relatively high initial bindings and the subsequent sharp wave of reductions in applied rates (Blackhurst, Enders, and Francois 1996; Francois 2001; World Bank 2001).

In addition to general Uruguay Round commitments, some important sectoral “zero-for-zero” agreements are reflected in the next to last column of table 3.1. In OECD economies roughly 10–30 percent of tariff lines are bound at zero.

With the implementation of Uruguay Round commitments, average ad valorem tariffs in the industrial countries are generally about 3 percent. There are important exceptions, however, such as textiles and clothing, for which the average rate is roughly three times the overall average, as reflected in the standard

TABLE 3.2 (Continued)

Effect of basic formula application on tariffs				Percentage reduction in average
Simple average	Standard deviation	Maximum tariff	Binding overhang	
3.0	2.9	10.9	0.1	−48.6
3.5	3.7	13.9	0.2	−43.0
1.9	2.4	11.5	0.1	−46.6
12.4	4.6	22.3	5.3	−3.7
29.5	14.9	70.8	31.3	−4.8
15.1	6.3	30.1	1.7	−43.0
1.9	1.4	5.0	0.1	−47.7
1.2	1.4	5.6	0.0	−48.5
1.7	1.6	6.1	0.0	−48.3
13.5	4.2	16.7	1.9	−15.4
11.3	9.2	30.5	0.3	−41.3
7.2	6.1	20.7	2.0	−31.6

Source: Author's calculations.

deviation and maximum tariff columns. With full implementation of current commitments, we estimate a simple average industrial tariff in the United States of 3.2 percent, a standard deviation of 4.3, and a maximum tariff of 37.5 percent. The European Union has a higher average but less dispersion, with an average rate of 3.7 percent, a standard deviation of 3.6 percent, and a maximum tariff of 17.0 percent.

For the developing countries in table 3.1, average industrial tariffs range from 3–4 percent to more than 20 percent. These estimates are biased downward by the omission of specific, compound, and mixed tariffs.³ Table 3.2 presents detailed data for three developing countries: Brazil, India, and Thailand. These countries span the spectrum of developing country bindings, as reflected in table 3.1. Brazil's tariffs are all bound, though the average rate for industrial products is 14.9 percentage points above the current applied rate. We refer to this gap as *binding overhang*. India and Thailand's tariffs are partially covered by bindings, with significant binding overhang.

As in the case of industrial tariffs, the stage for the agricultural negotiations was set largely by the Uruguay Round. One key difference between agricultural

and industrial products is that essentially all agricultural tariffs are bound. However, in both industrial and developing countries, there is a large degree of binding overhang, resulting from “dirty tariffication” or the use of “ceiling bindings” (Hathaway and Ingco 1996).

3.2 Some Tariff Reduction Formulas

A range of tariff-cutting formulas has been considered or implemented under the GATT and regional trade arrangements. This section focused on formulas implemented on a line-by-line basis, leaving discussion of discretionary approaches to section 3.4.

Baldwin (1986, 1987), Laird and Yeats (1987), Panagariya (2002), Stern (1976), World Bank (2003), and WTO (2003c) survey a range of alternative line-by-line formulas. The first is a simple proportional cut, frequently described as a linear cut in policy discussions:

$$t_1 = c \cdot t_0 \quad (3.1)$$

where t_1 is the rate after application of the formula; c is the constant proportion of the original rate to which tariffs are to be reduced; and t_0 is the initial tariff (which may be an MFN applied rate, a preferential rate in a regional negotiation, or a tariff binding in the WTO context).

After years of negotiations aiming to accommodate differences in countries' initial tariff rates, a 50 percent proportional cut formula was used in the Kennedy Round (1963–67). Some products were exempted from this approach and permitted smaller tariff reductions on the grounds of their sensitivity (Preeg 1970). Since the products exempted had much higher than average tariffs, these exemptions substantially reduced the cut in the overall average tariff. Baldwin (1987) estimates that despite these exceptions, the reduction in average tariffs on industrial products was 35 percent. This compares extremely favorably with the average of 2.5 percent achieved in the second through fifth rounds of GATT tariff negotiations, generally conducted under the request-and-offer approach.

An alternative proposal considered in the Tokyo Round negotiations, and suggested in a different form in the Doha negotiations by Konandreas (2003), was a general linear reduction approach:

$$t_1 = d + f \cdot t_0 \quad (3.2)$$

where d is a positive constant and f is a number between 0 and 1.0. As with equation (3.1), this formula may be written with tariffs in percentage or proportional terms by making an appropriate adjustment to the parameter d .

Equation (3.2) suffers from a potentially serious problem with low tariff rates. If the parameter d exceeds zero—which it must to yield larger percentage

reductions in higher rates—this formula will lead to increases in lower rates. While there may be a case for some such increases in tariffs as a way of reducing the variation in tariff rates and hence the cost of protection, such increases in tariffs do not sit easily with the trade-liberalizing *raison d'être* of the World Trade Organization (WTO). To deal with this problem, during the Tokyo Round proponents of this approach advocated that it be applied only for tariffs greater than 5 percent (Laird and Yeats 1987).

The formula accepted in the Tokyo Round was the Swiss formula:

$$t_1 = \frac{a \cdot t_0}{a + t_0} \quad (3.3)$$

where a is a positive tariff rate that becomes a ceiling on tariff rates. Expressed in proportional terms, the Tokyo Round value of this parameter was 0.14–0.16 (14–16 percent). In the Doha negotiations, the United States and the Cairns Group proposed use of the Swiss formula with a coefficient of 0.25 for agriculture.

The Swiss formula has a number of desirable features for tariff negotiations. The concavity of equation (3.3) in the initial tariff rate means that it reduces higher tariff rates by more, in both absolute and relative terms, than lower tariff rates. It is particularly effective in reducing peak tariffs, since even the very highest tariffs are reduced below the value a . From the importers' point of view, top-down approaches tend to reduce the economic efficiency losses associated with high and widely dispersed tariffs, and they preserve revenues, since import volumes tend to increase more on the higher tariff goods. Given the existence of industrial country tariff peaks in agriculture, textiles, and clothing, top-down approaches like the Swiss formula might also be expected to lead to greater market access gains by developing countries.

To understand the Swiss formula, it is useful to examine particular cases. For an extremely small initial tariff, say 0.1 percent, the coefficient by which t_0 is multiplied in equation (3.3) ($a/(a + t_0)$) is essentially 1.0, so there is no reduction in the tariff. For an initial tariff rate of a , the final tariff rate is a half of a , implying a 50 percent reduction from the initial tariff. For a very high initial tariff, $t_0/(a + t_0)$ approaches 1.0 and the tariff rate is effectively reduced to a .

A very stylized comparison of the proportional tariff cut of 0.5 used in the Kennedy Round with a Swiss formula using the parameter 0.16 from the Tokyo Round is given in figure 3.1. It shows that the cuts in low tariffs are smaller using the Swiss formula than using the proportional cut formula but that the cuts for tariffs above 0.16 are larger with the Swiss formula. No tariff would remain above 0.16 following application of this formula.

A number of other formula-type approaches to structuring market access expansion have been proposed. Josling and Rae (2004) consider alternatives, including reduction of bound rates to applied rates, introduction of ceilings on

Figure 3.1 Impacts of a Proportional and a Swiss Formula for Tariff Cutting

Source: Author's calculations.

tariffs, and “cocktail” approaches with different formulas, such as reductions to a ceiling rate, proportional cuts, and Swiss-formula cuts, over different ranges of tariffs. Hoekman and Olarreaga (2002) examine the introduction of a limit on the ratio of the highest tariffs to the average as a means of dealing with tariff peaks. The proposal by China, and the subsequent proposal by the chair of the Market Access Committee in the Doha negotiations (World Bank 2003), on nonagricultural market access introduced a Swiss formula with a coefficient based on each country's initial average tariff.

3.3 Introducing Some Flexibility to Line-by-Line Formula Cuts

There are good reasons to question whether a pure Swiss formula, with a common upper limit of about 0.15 as used in the Tokyo Round, would provide sufficient flexibility for all WTO members to reach agreement on tariff reductions in agriculture or nonagriculture in the Doha negotiations. It seems very possible that the lack of flexibility of the Swiss formula contributed to the exclusion of large numbers of products with high tariffs from the formula in the Tokyo Round. Many of these products were items, such as agricultural products, textiles, and clothing, that are of particular interest to developing countries, which were not active participants in the exchange of market access concessions at that point.

Hoekman and Olarreaga (2002) note that peak applied tariffs in the industrial countries are now about 50 times as high as the average rate. This contrasts with a ratio of 5 in the developing countries of Sub-Saharan Africa, 6 in Latin America,

7 in the Middle East and North Africa, 9 in South Asia, and 28 in East Asia. Clearly, the widespread use in developing country trade reforms of top-down liberalization approaches has had a profound impact on the distribution of developing country tariffs (López and Panagariya 1992). The combination of large differences in the means and the variances of tariffs across countries seems likely to create a need for a formula that could encompass the entire distribution of tariff rates while minimizing pressure for exceptions and special cases.

One possible approach to dealing with this problem involves application of a Swiss-type tariff reduction with a ceiling based on each country's initial average tariff rather than a common Swiss formula parameter a . In effect, this combines the targeting of the distribution of tariffs under the pure Swiss formula with the targeting of a reduction in the average tariff. This targeted formula approach reduces the "one size fits all" problem of a common a parameter. However, it still leaves potential political problems created by the very sharp top-down nature of the pure Swiss formula.

To address the flexibility problem, one might generalize the Swiss formula to allow more flexibility in dealing with different tariff profiles, as Francois and Martin (2003) suggest. Under this flexible formula approach, the idea is to allow greater flexibility to accommodate different preferences over tariff maxima and rates of reduction.

One way to provide some additional flexibility is to modify the original Swiss formula by introducing an additional parameter, b , into equation 3.3 to obtain

$$t_1 = \frac{a \cdot t_0}{a \cdot b + t_0} = \frac{1}{a^{-1} + b \cdot t_0^{-1}} \quad (3.4)$$

We call parameter b a flexibility parameter, as it allows the shape of the relationship between the initial and final tariffs to change.⁴ As can be seen from the second term in equation (3.4), the original Swiss formula is a special case of equation (3.4), with $b = 1$. As will become evident, the impact of tariff reductions on peak tariffs can be softened by raising the a parameter. As b increases, the formula tends to increase the reduction in the lower tariffs, allowing for higher maximum rates with the same target reduction in the average tariff. Clearly, there is an entire family of flexible Swiss formulas, distinguished by their b values.⁵ Comparing these formulas directly is difficult, since changing b changes both the curvature of the line and the average depth of cut. However, the widely available program Microsoft Excel's Solver can be used to find the combinations of a and b consistent with the targeted reduction in average tariffs and hence allow formulas with different curvature but the same depth of cut in average tariffs to be compared.

To avoid formulas that increase the value of some tariffs, the flexibility parameter, b , should be 1.0 or above. This extended Swiss formula retains the key feature

Figure 3.2 Flexibility and Swiss Formula-Based Tariff Reductions

Source: Author's calculations.

of the original Swiss formula that all tariffs are reduced below a ceiling given by a . For tariffs ranging from 0 to 90 percent, figure 3.2 shows the percentage reduction in each tariff rate needed given a target of a 50 percent reduction in the average tariff. It reveals that there is some scope for trading off cuts in higher tariffs with cuts in lower tariffs through adjustments to the compensation parameter. This family of curves clearly provides much greater flexibility to negotiators who hitherto had to choose one approach or the other.

There is a limit to the flexibility we can obtain using the compensation parameter. As b increases, larger cuts in smaller tariffs are substituted for smaller cuts in higher tariffs. Beyond some point, it becomes infeasible to meet the required reduction in average tariffs. As Francois and Martin (2003) show, adopting a combined targeted and flexible Swiss formula approach guarantees that peak rates will be cut by at least the cut in the average, even with flexibility.

3.4 Some Practical Issues

Several practical issues arise in implementing formula cuts. These include the specification of the goal in terms of the depth of cut, the choice of the base rate to be cut, and the potential need for additional flexibility in the negotiations.

3.4.1 *Average Cuts or Cuts in the Average?*

One fundamental parameter in negotiations is the objective of tariff reduction to be specified. Should it be specified in terms of a percentage reduction in average tariffs (simple or weighted), an average tariff cut, a ceiling tariff like the 0.15 used in the Swiss formula during the Tokyo Round, or as an average reduction in the price of imports?⁶ One widely advocated approach to tariff reduction, the Uruguay Round approach to agricultural trade liberalization, specifies its objective in terms of an average cut in tariffs and leaves countries free to choose the reductions at a tariff-line level, perhaps subject to a minimum cut requirement.

The difference between a cut in average tariffs and an average cut in tariffs seems minor but is actually fundamental. In both line-by-line approaches and those involving discretion at the tariff-line level, a cut in average tariffs is an appealing organizing objective, in that it provides a measure of progress from the initial regime toward complete free trade. By contrast, an average cut criterion is always close to meaningless, since it does not take into account whether the cuts are made to high or low tariffs. Under discretionary approaches, an average cut criterion encourages large percentage cuts in already low tariffs, as was evident in the Uruguay Round agreement on agriculture (Hathaway and Ingco 1996), possibly leading to little or no reduction in average tariffs. By leaving peak rates relatively unscathed, it may also exacerbate tariff escalation.

Proposals to use the Uruguay Round approach of a 36 percent average cut in tariffs, with a minimum cut of 15 percent in each tariff line, seem likely to result in much less liberalization than the “headline” 36 percent cut. Since members would be able to choose the tariff lines on which they make larger or smaller cuts, it would be feasible to make a reduction in the average tariff rate of a little over 15 percent. Consider, for example, a case in which a country has just two tariff rates, 1 percent and 100 percent, and policy makers want to minimize the change associated with this approach. The result is likely to be as shown in table 3.3.

The 36 percent average tariff cut can be achieved with a reduction in average tariffs of just 15 percent, less than half the specified goal. And virtually all of this is

TABLE 3.3 Large Differences between Average Cuts in the Tariff and Cuts in the Average Tariff

	Good 1 (%)	Good 2 (%)	Average (%)
Initial tariff rate	1	100	50.5
Tariff cut	57	15	36
New tariff	0.43	85	42.7

Source: Author's calculations.

the result of the totally inflexible minimum cut requirement. Since higher tariffs are typically the ones that are most politically sensitive, there is every reason to expect countries to behave like the country in the table. In this case, the result will be limited overall liberalization and particularly small reductions in the peak tariffs that are of greatest concern to developing countries. With relatively large reductions in low tariffs and limited reductions in high tariffs, tariff escalation may even become worse.

If all countries were keenly aware of the option to minimize liberalization and expected other countries to take advantage of this opportunity, the pressure on policy makers to minimize the extent of their liberalization would be intense. It seems likely that the outcome would be reductions of 15 percent in almost all tariff lines with significantly trade-restricting tariffs. This approach would do little to reduce the most restrictive tariffs.

If a discretionary approach is adopted, it would seem more logical to specify a target cut in average tariffs rather than an average cut in tariffs. While preserving the discretion that advocates of discretionary approaches demand, a reduction in the average criterion does impose some realistic discipline. An average cut criterion imposes essentially no discipline and hence provides no basis for an exchange of market access “concessions.”

3.4.2 Choice of Base Rate

A key issue in implementing any formula-based approach is the base rate to which the formula should be applied. In a regional negotiation context, this rate will generally be the preferential applied rate. Countries using a formula approach to reform their own tariffs would generally use the applied MFN rate as the base. Traditional GATT practice has been to focus on the bound rates contained in countries’ schedules of concessions. This has the important advantage of creating no disincentive for individual countries to undertake unilateral reductions in applied rates of the type that have so sharply reduced protection in developing countries during the past 20 years (World Bank 2001). In addition, this approach might be viewed as providing credit for unilateral liberalization, in the sense that a prior unilateral reduction of applied rates reduces one for one the cut in applied rates required in subsequent negotiations.

Clearly, the choice of bound rates as the base would mean that some countries would have to make only small, or no, reductions in applied rates. Since WTO negotiations depend on meeting the needs of all participants, the approach adopted must meet participants’ needs. At the end of the day, countries will consider whether the reductions in their partners’ applied rates and the increases in the security of their market access resulting from the chosen base and reduction formula (or other approach) are sufficient to make the resulting

package worthwhile. Historically applied rates, such as the rates applying at the end of a previous negotiation, would give credit for autonomous liberalization since that time, but they might create some disincentive for future liberalization.

3.4.3 *Additional Flexibility*

Even with the additional flexibility allowed by the extension of the Swiss formula proposed here, there is a risk that it would not be sufficiently general to meet the political constraints of all countries on all products. One way to deal with the problem of exceptions while allowing additional flexibility would be to make a formula cut first and allow for renegotiations with compensation from this new base. This approach shifts the onus in making exceptions from the country to its trading partners and seems much less likely to lead to fewer and smaller exceptions than the traditional discretionary approaches. Clearly, it would ensure the maintenance of a balance of concessions, the perceived lack of which created such difficulties in the Kennedy and Tokyo Rounds.

3.4.4 *Non-Ad Valorem Tariffs*

Another potentially serious problem is created by specific, mixed, and compound tariffs. Top-down formulas such as the Swiss formula cannot be directly applied to these tariffs, since it is not possible to know which are the high and low tariffs without knowing the value of the goods. One option would be to convert all specific tariffs to ad valorem form before applying the formula, as is specified for nonagricultural goods in the draft Cancun Ministerial Declaration (WTO 2003a).

Whether the approaches outlined in this section and the previous one have any chance of being acceptable depends heavily on the nature of the distributions of applied tariffs and tariff bindings in member countries. The tables in the next section provide an initial empirical assessment of the implications of formula approaches for a range of countries, taking into account the current distribution of their tariffs and tariff bindings.

3.5 Some Examples

A simple hypothetical analysis can illustrate some of the key implications of the approaches we discuss, including the implications of binding overhang. For concreteness, we specify a target for reduction in simple average tariff bindings of 50 percent, unbound tariffs initially bound at 150 percent of applied MFN rates, and the parameter b initially set to 1.0 and increased to 2.0. Agricultural and nonagricultural tariffs are treated separately.

Tables 3.4, 3.5, and 3.6 present the effect of formula-based reductions on the tariff schedules of the European Union, Japan, and the United States (industrial countries)

TABLE 3.4 Effects of a 50 Percent Reduction in Average Bound Rates in the European Union, Japan, and the United States

Region/variable	(a) parameter	Compensation (b) parameter	Simple average tariff (percent)
<i>European Union</i>			
*Ag	1	0	5.9
*NonAg	1	0	3.7
Ag	12.7	1.0	3.0
NonAg	6.4	1.0	1.9
Ag	16.5	1.2	3.0
NonAg	8.2	1.2	1.9
Ag	27.9	1.5	3.0
NonAg	13.7	1.5	1.9
Percentage of industrial tariff lines currently unbound: 0			
<i>Japan</i>			
*Ag	1	0	6.2
*NonAg	1	0	2.3
Ag	17.1	1.0	3.5
NonAg	6.3	1.0	1.2
Ag	22.7	1.2	3.5
NonAg	8.1	1.2	1.2
Ag	39.6	1.5	3.5
NonAg	13.9	1.5	1.2
Percentage of industrial tariff lines currently unbound: 84			
<i>United States</i>			
*Ag	1	0	3.5
*NonAg	1	0	3.2
Ag	12.4	1.0	1.9
NonAg	7.2	1.0	1.7
Ag	17.4	1.2	1.9
NonAg	9.5	1.2	1.7
Ag	34.7	1.5	1.9
NonAg	16.2	1.5	1.7
Percentage of industrial tariff lines currently unbound: 0			

TABLE 3.4 (Continued)

Standard error	Maximum tariff (percent)	Simple average binding overhang (percentage points)	Percentage reduction in average tariff
7.5	74.9	0.3	n.a.
3.6	17.0	0.4	n.a.
2.9	10.9	0.1	-48.6
1.4	5.0	0.1	-47.7
3.0	13.0	0.1	-48.5
1.5	5.7	0.1	-47.6
3.2	17.9	0.1	-48.4
1.6	7.1	0.1	-47.5
8.1	43.3	1.2	n.a.
3.4	30.9	0.1	n.a.
3.7	13.9	0.2	-43.0
1.4	5.6	0.0	-48.5
3.9	16.6	0.2	-43.2
1.5	6.8	0.0	-48.4
4.2	21.3	0.2	-43.7
1.6	9.7	0.0	-48.4
7.4	90.0	0.5	n.a.
4.3	37.5	0.2	n.a.
2.4	11.5	0.1	-46.6
1.6	6.1	0.0	-48.3
2.6	15.3	0.1	-46.2
1.7	7.3	0.0	-48.2
3.0	26.0	0.1	-45.9
1.9	9.9	0.0	-48.1

Source: Author's calculations.

Note: a:1, b:0 corresponds to zero cuts. The first two rows therefore represent post-Uruguay Round (or base) rates of tariffs. Agricultural tariffs are limited to ad valorem tariffs. Other specific tariffs may be applied to excluded tariff lines, typically at higher ad valorem rates than averages shown. n.a. = not available.

TABLE 3.5 Effects of a 50 Percent Reduction in Average Bound Rates in Brazil, India, and Thailand

Country/variable	(a) parameter	Compensation (b) parameter	Simple average tariff (percent)
<i>Brazil</i>			
*Ag	1	0	12.9
*NonAg	1	0	15.9
Ag	37.4	1	12.4
NonAg	31.8	1	13.5
Ag	47.0	1.2	12.4
NonAg	39.8	1.2	13.5
Ag	75.8	1.5	12.3
NonAg	64.3	1.5	13.5
Percentage of industrial tariff lines currently unbound: 0			
<i>India</i>			
*Ag	1	0	31.0
*NonAg	1	0	19.2
Ag	134.2	1	29.5
NonAg	38.3	1	11.3
Ag	169.9	1.2	29.5
NonAg	48.1	1.2	11.3
Ag	277.2	1.5	29.4
NonAg	77.6	1.5	11.2
Percentage of industrial tariff lines currently unbound: 38			
<i>Thailand</i>			
*Ag	1	0	26.5
*NonAg	1	0	10.5
Ag	38.2	1.0	15.1
NonAg	27.8	1.0	7.2
Ag	48.9	1.2	15.1
NonAg	35.0	1.2	7.2
Ag	81.5	1.5	15.1
NonAg	56.5	1.5	7.2
Percentage of industrial tariff lines currently unbound: 32			

TABLE 3.5 (Continued)

Standard error	Maximum tariff (percent)	Simple average binding overhang (pct points)	Percentage reduction in average tariff
5.1	27.0	22.6	n.a.
6.0	35.0	14.9	n.a.
4.6	22.3	5.3	-3.7
4.2	16.7	1.9	-15.4
4.6	23.2	5.3	-4.0
4.3	16.8	1.9	-15.3
4.6	24.7	5.4	-4.5
4.4	17.1	1.9	-15.1
20.8	150.0	90.7	n.a.
16.5	40.0	3.9	n.a.
14.9	70.8	31.3	-4.8
9.2	30.5	0.3	-41.3
15.0	72.0	31.4	-4.9
9.3	34.7	0.3	-41.3
15.1	73.5	31.4	-5.0
9.3	35.0	0.3	-41.3
14.4	65.0	7.1	n.a.
10.8	80.0	7.8	n.a.
6.3	30.1	1.7	-43.0
6.1	20.7	2.0	-31.6
6.6	34.6	1.7	-42.9
6.1	23.0	2.0	-31.4
7.2	43.8	1.7	-42.9
6.2	27.4	1.9	-31.1

Source: Author's calculations.

Note: a:1, b:0 corresponds to zero cuts. The first two rows therefore represent post-Uruguay Round (or base) rates of tariffs. Agricultural tariffs are limited to ad valorem tariffs. Other specific tariffs may be applied to excluded tariff lines, typically at higher ad valorem rates than averages shown. n.a. = not available.

TABLE 3.6 Welfare Implications of a 50 Percent Reduction in Bound Tariffs under Different Degrees of Flexibility
(percent of GDP)

b	United States	European Union
1	0.0548	0.0463
1.2	0.0535	0.0455
1.5	0.0508	0.0440

Source: Author's calculations.
Note: For the impact on tariff structures, see table 3.5.

and Brazil, India, and Thailand (developing countries). Table 3.4 summarizes the results for the basic Swiss formula; tables 3.5 and 3.6 illustrate the effect of adding flexibility while maintaining the same reduction in average bindings. These results are summarized in figure 3.3.

For the United States bound rates are generally very close to applied rates. This is reflected in low initial binding overhang (the gap between average bound and applied rates as a percentage of the average applied rate). This means that all

Figure 3.3 Binding Overhang in Industry
The impact of a 50 percent reduction in bound rate average on applied rate average

Source: Author's calculations.

formulas considered lead to significant cuts. The result is a reduction in maximum rates, average rates, and variance. Peak rates are not reduced as much when the flexibility parameter b is raised above 1.0 (table 3.4). In particular, while still achieving a 50 percent reduction in the average bound rate, the United States would be able to keep its highest ad valorem applied rates on industrial goods in the range of 7.3–9.9 percent, depending on the selection of the b parameter. Similarly, the European Union would be able to keep some peak industrial rates at up to four and a half times the average tariff.

In Brazil, by contrast, average bound rates are well above applied rates. This is reflected in table 3.4, table 3.6, and figure 3.3. With a 50 percent reduction in average bindings, Brazil's average industrial applied rate falls by 15.4 percent of its base value. While smaller than the proportional cut in average tariffs in the developed countries, this translates into a larger percentage reduction in the cost of imports than those observed in developed countries. In agriculture the binding overhang is so great that almost nothing happens to applied rates (a 50 percent reduction in bindings yields only a 3.7 percent reduction in applied rates). However, the binding overhang would be reduced sufficiently to ensure real liberalization in subsequent negotiations and to constrain potential future increases in tariffs.

India also realizes only a very small cut in applied agricultural tariffs, again reflecting high binding overhang in both developed and developing countries. The reduction in the average industrial tariff (8 percent) is greater than in Brazil, implying a much larger reduction in the price of imports than in the case of the developed countries.

Thailand, with less binding overhang, realizes greater reductions in agricultural tariffs, with these tariffs reduced by more than 40 percent relative to their initial average level. In the industrial sector, Thailand's reduction in applied rates is just over 30 percent, which necessitates a reduction in applied tariffs of about 3 percentage points. This generates a reduction in the price of imports that is larger than in the developed country cases considered.

In agriculture the extent of binding overhang is much greater. Even with a large cut, such as the 50 percent cut in bindings considered here, Brazil and India make only small reductions in applied rates on agricultural goods. Thailand, by contrast, sharply reduces agricultural tariffs, because of its limited binding overhang.

3.6 Welfare Implications of Introducing Flexibility

When considering an approach that would increase the political flexibility of negotiating modalities, it is important to have some idea of the potential economic costs of allowing such flexibility. One consideration is for efficiency in the importing country. For the single-country case, economic theory tells us that

top-down reductions in protection are likely to lead to greater welfare gains in the importing country than proportional cuts or, a fortiori, approaches that allow high tariffs to be reduced by less than low tariffs.

A second consideration is the potential distribution of market access gains across countries. Given the preponderance of tariff peaks in the products exported by developing countries to the industrial world, top-down approaches seem more likely to reduce the tariffs that are of greatest concern to developing countries and hence to increase their market access gains. This potential difference can be measured by examining the impacts of different approaches on the average tariffs facing developing countries.

3.6.1 *Efficiency Effects on Importers*

Economic theory provides two classic rules of thumb for piecemeal tariff reduction in a single, small country: that a proportional reduction in all tariffs will increase welfare and that a reduction in the highest tariff will increase welfare as long as this good is a net substitute for all other goods (Vousden 1990). Vousden also shows that these welfare-improving conditions apply to multilateral, as distinct from unilateral, trade reforms as long as compensation is allowed. These rules, and the simple intuition given above, strongly suggest that a formula, such as the Swiss formula, that is strongly top-down will be welfare improving—and more strongly welfare improving than a proportional cut. The actual difference between a Swiss-formula type cut and a proportional cut is ultimately an empirical question; theory tells us the direction of the difference (“Swiss is better than proportional”) but not the magnitude.

A simple approach to investigating whether use of greater flexibility, and hence a move away from strongly top-down to a more proportional cut, will have major welfare implications is to draw on the distorted trade expenditure function introduced by Lloyd and Schweinberger (1988) and further developed by Anderson and Neary (1992). While we could take a computable general equilibrium (CGE) modeling approach, this would require considerable aggregation of the tariff data, which might cause us to lose information in the dispersion of tariffs within the 20 or so aggregates routinely used in CGE analysis. Instead, we have used a more disaggregated, but simpler, model, with about 5,000 tariff lines identified separately and identified as substituting in Armington fashion relative to a single, domestically produced good.⁷

We begin by representing the relevant features of the economic structure with the welfare evaluation approach that Lloyd and Schweinberger developed, a distorted trade expenditure function:

$$B = e(p, v) - g(p, v) - z_p(p, v, u) \cdot (p - p^*) \quad (3.5)$$

where B is the balance of trade; e is the expenditure function in a vector of domestic prices and total utility, u ; g is revenue from production as a function of domestic prices and a vector, v , of resources (we might generalize this by using a profit function with variable intermediate inputs); z_p is the derivative of $(e - g)$ and equal to net imports of each good; and p^* is a vector of world prices.

If we assume a standard Armington-type structure in a small economy, with imports differentiated from domestic goods but domestic goods perfectly substitutable with exports, we can simplify the analysis of tariff changes by focusing only on $e(p, u)$ and the tariff revenue function. When tariffs change, there will be no change in the realized value of $g(p, v)$, which can be ignored, unless there are distortions such as export taxes.

To make the approach easy to apply, we write the expenditure and revenue functions using a constant elasticity of substitution functional form for the expenditure function and a tariff revenue function based on the import demand functions derived from the first derivatives of this function with respect to prices. In this situation, for a single economy the relevant elements of the distorted trade expenditure can be written

$$B = [\sum_j \beta_j (p_j^* (1 + t_j))^{1/(1-\sigma)}]^{1/(1-\sigma)} \cdot u - \sum_j p_j^* \cdot \beta_j [p_j (1 + t_j) / P]^{-\sigma} \cdot u \quad (3.6)$$

where $P = [\sum_j \beta_j (p_j^* (1 + t_j))^{1/(1-\sigma)}]^{1/(1-\sigma)}$, σ is the elasticity of substitution, and the β_j 's are the distribution parameters of the constant elasticity of substitution expenditure function.

We calibrate this function using data on imports from the UNCTAD Trade Analysis and Information System (TRAINS) database and data on consumption of domestically produced goods from the World Bank's *World Development Indicators*. In line with standard practice in the CGE literature, all domestic prices were initially set to unity to allow decomposition of value data into prices and quantities. This allowed the β coefficients to be determined from the value share data at domestic prices. A σ value of 4 was assigned, raising the elasticity of substitution above that in most empirical estimates of import demand functions on the grounds that we are dealing with very finely disaggregated trade data, for which relatively high elasticities of substitution might be expected.

While the analysis in the earlier sections of this chapter was undertaken for agriculture and for industrial products separately, in line with the negotiations at the WTO, this approach would not be satisfactory for the welfare analysis. Second-best effects associated with reducing one set of tariffs while leaving another set unchanged might overwhelm the welfare effects of interest—those associated with different degrees of progressiveness in the reduction of high tariffs.⁸ Therefore, we repeated the analysis using the extended Swiss formulas to reduce all tariffs in each sample country.

The tariff schedules of the European Union and the United States were analyzed for the case of a 50 percent reduction in simple average tariffs. These results are presented in table 3.6 for the three different values of the b parameter identified in the earlier tables. As might be expected given the very low levels of the ad valorem tariffs included in the database, the gains are very small. As might also be expected, the gains from reform for the United States rise as the tariff reduction formulas are made more strongly top-down. However, the differences between the gains with different degrees of flexibility are quite small. A similar pattern emerges for the European Union. In both cases, moving from the standard Swiss formula to a Swiss formula with a flexibility parameter of 1.5 causes only a very small reduction in the welfare gains from liberalization.

What do these results suggest? The results are very partial, reflecting only the efficiency gains from own-country liberalization. Furthermore, they are based on tariff information that excludes the effects of specific, compound, and mixed tariffs and other charges, such as antidumping duties. That said, they are based on very widely dispersed real-world tariff data collected at a fine level of disaggregation and probably have some relevance for inferences about national and global efficiency gains from trade reform.

The conclusion we draw is that whether and how flexibility is added is a second-order issue and should not be a roadblock to reducing average tariffs. The selection of which formula to choose, at least among the top-down options spanned by the flexible Swiss formula, is thus nowhere near as important as selecting and imposing a targeted reduction in the average.⁹ It may be better to focus on achieving large reductions in average tariffs, even if the price is acceptance of an approach, such as a pure proportional cut, that allows some tariffs to remain relatively high. This result may, of course, not be acceptable, particularly if such approaches do not achieve needed reductions in some of the key tariff peaks restricting global market access or increase market access by developing countries.

3.6.2 *Market Access Gains to Developing Countries*

A key empirical issue is the extent to which changing the dispersion of overall protection for a given average cut in tariffs affects the average reduction in protection facing developing countries. In contrast with the efficiency issue, there is little that theory can say to guide whether top-down cuts will be more successful in reducing the barriers developing countries face. Developing countries generally face higher MFN tariff barriers against their exports than do industrial countries (World Bank 2003). Many have concluded that this difference reflects to a significant degree the limited presence before the Uruguay Round of developing countries in the main game of multilateral negotiations—the exchange of market access

Figure 3.4 Implications of Alternative Tariff-Cutting Rules for EU Tariffs Facing Low-Income Developing Countries

Source: Author's calculations.

Note: Average tariffs are shown on the vertical axis.

concessions. Whatever the cause of this discrepancy, it implies that the greater the extent to which developing countries face disproportionately high tariffs, the more beneficial approaches that attack tariff peaks more aggressively are likely to be for developing countries.

To examine this issue, we increase the b parameter in equation (3.4) to reduce the concavity of the tariff-cutting formula. At one extreme, we consider the classic Swiss formula, set in such a way that it brings about a 50 percent reduction in tariffs, with the greatest reductions, by far, in the highest tariffs. We then allow for increasing degrees of flexibility up to the point at which all tariffs are reduced by a flat 50 percent. This is done by increasing the flexibility parameter in the extended Swiss formula from 1.0 to 2.0.

The results of this analysis are presented in figure 3.4 for EU tariffs faced by exports from low-income countries and in figure 3.5 for U.S. tariffs faced by the same countries. A classic Swiss formula used to target a 50 percent cut in the simple average tariff on imports into these two large economies does indeed lead to larger reductions in the weighted average tariffs facing low-income countries. The reduction in tariffs is 56 percent in the United States and 55 percent in the European Union. As the flexibility of the cuts is increased, the reductions in average tariffs faced by low-income countries fall progressively to 50 percent when tariffs are cut proportionately.

Figure 3.5 Implications of Alternative Tariff-Cutting Rules for U.S. Tariffs Facing Low-Income Developing Countries

Source: Author's calculations.

Note: Average tariffs are shown on the vertical axis.

This simple analysis confirms our initial hypothesis that top-down approaches produce larger reductions in tariffs facing low-income countries for any given reduction in the importers' average tariff. This gain is an important equity reason to strongly favor top-down approaches to tariff cutting, such as the Swiss formula, over more flexible, and perhaps more politically salable, alternatives, such as a proportional cut. Approaches, such as an average cut rule, that allow peaks to be retained are likely to further reduce market access gains for poor countries.

3.7 Concluding Remarks

In this chapter we first considered the advantages of formula approaches to trade negotiations, noting the apparently widespread acceptance of these advantages in the current WTO negotiations under the Doha Agenda. An important feature of these negotiations is the search for compromise between those seeking aggressive top-down market liberalization and those seeking more limited liberalization or no reform at all. We then examined the key features of the market access landscape that affect the choice of approaches to negotiations. These features include the large dispersion of average tariffs among the active participants in the negotiations and the large gaps between applied and bound tariff rates in many countries and sectors.

In implementing a formula approach, one key practical issue is whether countries are to have discretion in the depth of cuts on individual tariff lines. Where

countries have discretion, an average cuts criterion was shown to provide essentially no discipline. A seemingly similar, but in fact fundamentally different, criterion of a required reduction in the average tariff rate would potentially introduce some discipline by requiring cuts in at least some high tariffs.

Our review of potential approaches to tariff reduction covers a range of line-by-line tariff formulas. The Swiss formula approach used in the Tokyo Round is seen as particularly desirable because of its ability to introduce a tariff rate ceiling and to bring about larger reductions in the highest tariff rates. Unfortunately, it may be too restrictive to be fully applied in its original form, particularly because of the large dispersion in the average and variance of countries' tariff rates and the presence of binding overhang in many countries.

To overcome, or at least reduce, this restrictiveness, we examined the implications of targeted and flexible Swiss formula approaches. The targeted approach is a simple adaptation of the Swiss formula that is targeted to a specific reduction in average tariffs for particular country and commodity groups (for example, agricultural and nonagricultural). The second approach is a more flexible version of the Swiss formula that would allow the same cut in the average tariff to be achieved with somewhat smaller reductions in peak tariffs. Essentially, this increase in flexibility would allow larger cuts in smaller tariff rates to be used to compensate for smaller reductions in higher tariffs. While such a change would almost certainly reduce economic efficiency, it may ultimately be preferable to a retreat into exceptions as a way of reaching a politically acceptable agreement. This flexible formula approach potentially allows for a Swiss family of formulas—with different trade-offs between tariff cuts on higher and lower tariff rates.

We examined the potential outcomes of applying this family of formulas in three industrial country markets (Europe, Japan, and the United States) and three developing country markets (Brazil, India, and Thailand). As an illustration, we targeted cuts in average bound tariff rates in each country, considering agricultural and industrial products separately. Preliminary analysis suggests that, in this situation, only a bold cut, such as the 50 percent target used in the Kennedy Round, would substantially increase market access in both developing and developed countries.

In the last section of the chapter, we developed two simple methodologies for evaluating the consequences of different tariff formulas. The first approach evaluates the welfare consequences for the importer of different tariff reductions. When the welfare implications of different versions of the flexible Swiss formula are considered over the range from the Swiss formula to a proportional cut, we find that the gains are very similar for different degrees of flexibility. This is illustrated with data for the European Union and the United States. The basic message is the same in both cases: increasing flexibility appears to have only a small impact on the

efficiency gains accruing from a 50 percent tariff cut. From the point of view of economic efficiency in the importing country, this result suggests that the depth of cut in the average tariff may be more important than the extent to which this reduction is brought about by reducing tariff peaks.

The extent to which the formula used succeeds in bringing down high tariff rates relative to others seems to matter more for developing countries than developed ones. Because many of the exports of developing countries face high tariffs in developed countries, we expected top-down approaches to be more effective in increasing market access by developing countries. This expectation was borne out by our results: formulas that reduce peak tariffs in developed countries yield greater increases in the market access of developing countries for any given reduction in average tariffs.

Notes

1. As Deardorff (2000) notes, to pursue a formula-type approach for services, barriers would need to be converted into tariff equivalents. To date no effort to consider this has been pursued in the GATS context.

2. López and Panagariya (1992) point out that the presence of nonproduced intermediates weakens this general proposition.

3. This omission has recently been remedied for applied rates in a few countries in the WTO's Integrated Database; in UNCTAD's TRAINS database, available through the World Bank's *World Integrated Trade Solutions* (WITS) program; and in data compiled by the International Trade Centre and the Centre d'Etudes Prospectives et d'Informations Internationales.

4. The first expression in equation (3.4) shows its similarity to the original Swiss formula. The second shows the source of the asymptotic feature of the formula—division by a rectangular hyperbola in the tariff rate.

5. This might be called a Swiss Army knife approach to tariff reduction.

6. This measure, defined for a small country by $\Delta t / (1 + t)$, where Δt is the change in the tariff rate, is an important determinant of the increase in market access resulting from a negotiation.

7. A better longer-term solution to this problem would be to use a two-stage aggregation approach such as that proposed by Bach and Martin (2001).

8. The importance of this problem can readily be overstated. At least at the level of aggregation used in a CGE model, Hertel and Martin (2001) find that these second-best welfare impacts were very small in a prospective new round of WTO negotiations.

9. Of course, if escalation-increasing approaches such as the Uruguay Round approach are considered, it may well be important to consider more than the resulting reduction in the average.

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REFORM OF SERVICES POLICY AND COMMITMENTS IN TRADE AGREEMENTS: AN ANALYSIS OF TRANSITION ECONOMIES

Felix Eschenbach

It is a stylized fact of economic development that the share of services in gross domestic product (GDP) and employment rises as per capita incomes increase (Francois and Reinert 1996). This reflects increasing specialization and exchange of services through markets, with an associated increase in variety and quality that may raise the productivity of firms and the welfare of final consumers, in turn increasing demand for services. It also reflects the limited scope for (labor) productivity in the provision of some services, implying that over time the (real) costs of these services will rise relative to merchandise, as will their share of employment (Baumol 1967; Fuchs 1968). As a result of the greater mobility of people and technological change, services are increasingly becoming tradable, increasing the scope for specialization in production and trade. The competitiveness of firms—both domestic enterprises operating in the local market and exporters operating in international markets—depends on the availability, cost, and quality of producer services, such as finance, transport, and telecommunications.

Standard economic growth theory postulates that growth is a function of only capital and labor inputs. It accords no special role to services. Services play a more prominent role in the literature on financial sector development (see Levine 1997

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for a survey). This literature recognizes that financial intermediaries do not simply passively convert savings into physical investment. Instead, temporary or permanent growth effects of capital accumulation and productivity improvement are supported by financial intermediaries (banks, capital markets) that actively mobilize savings and channel them toward profit-maximizing investment opportunities. Another strand of the growth literature that (implicitly) emphasizes a services dimension stresses the importance of human capital (education) and R&D in generating (endogenous) growth (Lucas 1988; Romer 1990).

The role of producer services in the growth process has not attracted much attention in the theoretical or empirical growth literature. Francois (1990) develops a model that points to the importance of such services for economic growth, but his model is not dynamic. He argues that the increasing importance of producer services in modern (growing) economies reflects economies of scale and specialization. As firm size increases and labor specializes, more activity needs to be devoted to coordinating and organizing the core businesses of a company. This additional activity is partly outsourced to external service providers. The associated organizational innovations and expansion of “logistics” (network) services yields productivity gains that in turn should affect economywide growth performance by enhancing the efficiency of production in all sectors. The associated cost reductions can have the effect of upgrading overall productivity, and they are likely to be enhanced by, if not conditional on, increased foreign direct investment (FDI) in services (Konan and Maskus 2005; Markusen, Rutherford, and Tarr 2005).¹

Transition economies in Europe and Central Asia have undertaken numerous policy reforms in the services area. All had very small service sectors before 1990, reflecting the emphasis under central planning on industry and the bias against service sector activities. Service sector reform in these countries has thus had the character of a natural experiment, allowing the macroeconomic impact of liberalization and privatization of service activities in an initially very hostile policy setting to be studied. The use of trade agreements as focal points for reform, the subject of this chapter, can also be analyzed in these countries.

The chapter starts with a brief summary and synthesis of policy reforms in services in 16 transition economies between 1990 and 2004. It then analyzes the use that was made by governments of the General Agreement on Trade in Services (GATS) in committing such reforms. Descriptive statistics are generated on the extent to which countries committed to the World Trade Organization (WTO) disciplines on market access and national treatment restrictions. These statistics are then compared with indicators of the actual policy stances of the 16 countries. An effort is made to categorize countries according to the purpose for which they use the GATS. These include relying on other liberalization mechanisms (such as European Union [EU] accession), so that GATS commitments have little information

(it does not matter whether they are far-reaching or not); using the GATS as a mechanism to help pursue reform (that is, as a lock-in device) or as a signal to investors that their markets are more (most) open; using it as a signaling device without committing seriously to reform; and limiting commitments in the GATS in order to maintain restrictions on foreign suppliers. Insofar as the third case applies, questions regarding the effectiveness of the GATS enforcement mechanisms arise.

The remainder of the chapter is organized as follows. Sections 4.1 and 4.2 discuss the evolving role of services and services-related policy reform in transition economies. Sections 4.3 and 4.4 are devoted to services trade and the use of the GATS as a commitment device. Section 4.3 describes the degree of openness that is reflected in the schedules of GATS commitments of the 16 transition economies in the sample. Section 4.4 compares these commitments to the actual service sector policy reforms that have occurred and divides the 16 countries into three groups: those for which the GATS is largely redundant as a commitment device, those for which the GATS is important and whose commitments are in line with actual policies, and those that make commitments but perform badly in terms of actual policy. The third category suggests that in terms of the GATS, the focus of attention should not be just on expanding coverage but also on more effectively enforcing commitments. Section 4.5 summarizes the chapter's main conclusions.

4.1 Shifts in the Structure of Services in Transition Economies

Service industries were generally neglected under central planning. Marxist thinking emphasized the importance of tangible (material) inputs as determinants of economic development and classified employment in the service sector as unproductive. The lack of producer services was reflected in transport bottlenecks, queuing for and low quality of telecommunications, the absence of efficient financial intermediation, and much lower employment in services than in Organisation for Economic Co-operation and Development (OECD) countries.² Many of the services that are critical to the functioning of a market economy—a financial sector that allocates investment funds efficiently, firms that design, advertise, package, distribute, manage, handle logistics, and so forth—simply did not exist.

The share of services in GDP and employment has grown significantly since 1990 in almost all transition economies. In 1990 these countries lagged far behind high-income OECD countries, where the share of services in employment and GDP was about 63 percent. In contrast, the figure in the transition economies of Europe and Central Asia was 30–40 percent. These shares had increased substantially by 2003. The greatest growth took place in the Baltic countries, which had almost converged on the OECD average of 68 percent in terms of GDP shares,

Figure 4.1 Changes in the Share of Services in GDP and Employment

Source: World Bank, World Development Indicators database.

Note: CEE = Central and Eastern European countries (Czech Republic, Hungary, Poland, Slovak Republic, Slovenia); FSU1 (former Soviet Union) = Estonia, Latvia, Lithuania; FSU2 = Belarus, Moldova, Russian Federation, Ukraine; FSU3 = Armenia, Azerbaijan, Georgia; FSU4 = Kazakhstan, Kyrgyz Republic, Tajikistan, Turkmenistan, Uzbekistan; SEE = South Eastern Europe (Albania, Bosnia and Herzegovina, Bulgaria, Croatia, FYR Macedonia, Romania, Serbia and Montenegro).

although employment shares remained lower (figure 4.1). The Central and Eastern European countries that joined the European Union in 2004 have also converged to a large extent. Much less progress has been made by in Central Asia, where natural resource-based activities continue to constitute a major share of GDP.³

Input-output tables for 2001, the latest year for which data are available on many countries in Europe and Central Asia, provide information on differences in economic structure and the extent to which countries in the region have converged to comparators in the rest of world in terms of intermediate services use, final demand, and the service intensity of exports. Table 4.1 reports the direct contribution of agriculture, mining, manufactures, and services to total exports, expressed as the share of total exports of goods and services. It shows that Albania, Croatia, and the Baltic countries are the most services-intensive in exports. The second column in table 4.2 reports the sum of the direct and indirect linkage effects generated by a unit of export revenue—the total activity generated by one unit of foreign exchange (exports). The average multiplier is 3.6—that is, every \$1 of exports generates \$3.60 in economic activity. On average a little over one-third of this total activity is related to services, ranging from 27 percent (in the Czech Republic) to 52 percent (in Albania). Many transition economies are more services oriented than developing countries such as China or Malaysia.

TABLE 4.1 Sectoral Share of Total Export Revenue in Selected Transition Economies, 2001 (percent)

Country	Agriculture, food, and mining	Manufactures	Services
Albania	19	35	46
Croatia	9	49	42
Czech Rep.	5	80	15
Hungary	7	76	17
Poland	10	73	17
Romania	4	85	10
Slovak Rep.	4	86	10
Slovenia	4	81	15
Estonia	11	66	22
Latvia	13	64	24
Lithuania	13	63	24
Russian Fed.	40	52	8

Source: Global Trade Analysis Project (GTAP) Input-Output data derived from Social Accounting Matrices for 2001 (<https://www.gtap.agecon.purdue.edu/>).

Although technology is making it easier to trade services, a commercial presence (that is, FDI) is often required to sell services. Given the lack of a service sector under central planning, FDI can be expected to play a particularly important role, more so than in countries in which incumbent competition confronts foreign providers.

Overall, services account for some 62 percent of the stock of FDI in the reporting countries (table 4.3), with finance, transport, communications, and distribution services accounting for the largest shares.⁴ The service intensity of FDI is highest in the Baltic countries, presumably reflecting their relatively small size and limited manufacturing base, and lowest in Romania and the Ukraine. As a share of GDP, FDI in services is also very high in the Baltic countries. It is lowest in Romania, the Russian Federation, and Ukraine.

This snapshot of trends in the share of services in GDP, employment, output per worker, trade, and FDI reveals both substantial convergences toward European countries and a distinct difference between the Central European and Baltic countries on the one hand and countries in Central Asia and the former Soviet Union on the other. Given that trade and FDI in services can be expected to be associated with the acquisition of new technologies, higher service standards, and more effective delivery, these differences should help explain the observed higher labor productivity performance in services in Central Europe and the Baltic countries. The rest of this chapter explores whether these developments in the service sector are determinants of the aggregate growth performance of countries.

TABLE 4.2 Total Export-Related Activity (Direct and Indirect Linkages) in Selected Transition and Comparator Economies, 2001

Country	Share of total exports (percent)				
	Multiplier	Agriculture and food	Mining	Manufactures	Services
<i>Transition economies of Europe and Central Asia</i>					
Albania	4.8	20	4	24	52
Croatia	2.9	18	1	36	45
Czech Rep.	3.0	10	2	61	27
Hungary	2.8	10	2	51	37
Poland	4.2	17	3	43	38
Romania	6.6	27	3	39	30
Slovak Rep.	2.9	12	3	57	28
Slovenia	2.9	10	1	58	31
Estonia	2.5	15	2	49	35
Latvia	3.0	17	1	36	47
Lithuania	3.5	17	4	36	42
Russian Fed.	3.6	14	17	30	39
<i>Other countries</i>					
China	3.7	18	3	62	17
Cyprus	2.5	10	7	30	52
Germany	3.3	7	1	49	43
Malaysia	2.1	8	3	64	25
Turkey	3.7	17	2	40	41

Source: GTAP Input-Output data derived from Social Accounting Matrices for 2001 (<https://www.gtap.agecon.purdue.edu/>).

Services outcome variables are, of course, endogenous, influenced by the policy stances of governments, so the focus is on the impact of policy reforms.

4.2 Policy Stances and Service Sector Reform

Service sector reform involves a mix of deregulation (the dismantlement of barriers to entry and the promotion of competition) and improved regulation (putting in place an appropriate legal environment, strengthening regulatory agencies, increasing their independence, and so forth). The policy challenge is to achieve a balance between effective regulation and an increase in the contestability of markets.

Transition economies have done much to reform and adapt policies and regulatory regimes for service industries. Figure 4.2 plots three indicators of the extent of policy reform in banking, nonbank financial services, and infrastructure. These

Figure 4.2 Services Reform Index, 2004

Source: EBRD 2004.

Note: See box 4.1 for definitions of service sectors.

indexes, constructed by the European Bank for Reconstruction and Development (EBRD), range from 1.0 to 4.3 and span the period 1990–2004 (box 4.1). The 2004 value provides a measure of the progress that has been made by countries in converging to “best practice” standards, indicated by an index value of 4.3.

The data are subject to limitations, because they do not cover all service sectors and are somewhat arbitrary, due to a certain amount of personal judgment in the assessment. They do, however, give a reasonable impression of the reform agenda put in place in these countries. The infrastructure index in figure 4.2 is the average of indexes 3–7 in box 4.1; indicator 1 is used as an index for the banking sector, and indicator 2 is used as an index of nonbanking financial services.

Central and Eastern European countries and the Baltic countries have made the most progress in all three policy areas. In the other transition economies, there is significant variation across indexes. South Eastern Europe has advanced the most on reforms in banking and infrastructure, followed by the Caucasus (FSU3). The European countries of the former Soviet Union (FSU2) have done the most in the nonbanking financial services area, followed by South Eastern Europe. The Central Asian republics have made the least progress in all three areas, with one country—Turkmenistan—not advancing at all in any.

4.2.1 Financial Services

In Central and Eastern Europe and the Baltic countries, the banking sector is characterized by small shares of credit allocated through state-owned banks and a

TABLE 4.3 Stock of Inward Foreign Direct Investment, by Sector and Country, 2003 (percent)

Sector	CZ ^a	HU ^a	PL ^a	SK	SI ^a
Agriculture, forestry, fishing	0.1	1.3	0.4	0.2	0.0
Mining and quarrying	1.4	0.3	0.3	0.8	0.0
Manufacturing	35.5	45.8	35.8	37.5	43.3
Electricity, gas, water supply	6.9	4.6	2.6	11.7	1.0
Construction	1.9	1.1	2.6	0.7	0.1
Distribution and repair services	11.9	11.1	17.1	11.2	14.5
Hotels and restaurants	1.2	1.1	0.6	0.5	0.4
Transport, storage, communication	13.6	10.1	10.4	10.0	4.4
Financial intermediation	15.9	10.3	21.3	23.5	18.8
Real estate, rental, business activities	9.3	11.7	7.5	3.2	15.2
Education, health, social work	0.2	—	—	0.4	0.1
Other community and personal services	2.4	—	—	0.3	0.5
Other not classified activities	0.0	1.0	1.4	—	1.7
Real estate purchases by foreigners	—	1.5	—	—	—
Total share of services ^f	56.2	47.9	60.9	49.8	55.7
Value of stock of FDI in services (billions of dollars)	26.7	22.9	36.8	5.6	2.8
Stock of FDI in services as percentage of GDP	31.6	27.7	17.6	17.6	7.7

high level of foreign participation. Although weaknesses remain in the legal framework (creditor rights, the bankruptcy code), central bank independence has been strengthened in most of these countries. Cukierman, Miller, and Neyapti (2001) develop a measure of independence that includes 16 (weighted) components. They conclude that in Central and Eastern Europe and the Baltics, the degree of independence has converged to that of the German Bundesbank in the 1980s. Most other transition economies fall substantially short of this. Their measure, however, reflects only legal, not actual, independence. If actual independence is taken into account, the divergence across countries increases. The Central Bank of Belarus, for instance, has a high degree of legal but a low degree of actual independence.

Banking markets in many countries of the former Soviet Union tend to be relatively closed, in both a formal and informal (*de facto*) sense. However, there is significant variation across countries. Armenia's financial sector is relatively open and scores higher in terms of regulation. Formal limits on foreign participation (globally or on an individual bank basis) play a role in some countries, but

TABLE 4.3 (Continued)

EE	LV	LT	BG	CR	RO	RU ^b	UK ^a
0.4	1.5	0.8	0.3	0.3	0.7	0.4	2.1
0.4	0.6	0.8	1.1	3.1	—	—	2.4
18.2	15.5	31.1	33.4	30.6	54.3	45.0 ^c	46.4
2.4	3.4	4.4	1.0	1.1	—	—	1.6
2.5	1.0	1.2	2.7	0.9	2.4	2.2	2.9
15.9	18.0	17.9	18.0	6.9	16.4	22.0 ^d	18.5
1.7	1.3	1.6	1.7	4.0	2.4	—	2.3
17.7	11.9	17.1	15.7	25.0	7.8	9.5	7.2
28.1	15.0	15.7	17.7	24.6	—	1.8	8.1
11.4	24.5	7.3	3.9	3.1	—	8.2	4.7
0.1	0.1	0.2	0.3	0.0	—	—	2.3
0.8	1.1	1.5	0.8	0.5	—	0.2	1.5
0.4	6.0	0.3	3.2	—	16.0 ^e	11.0	—
—	—	—	—	—	—	—	—
78.6	78.9	62.8	65.2	64.9	45.0	54.6	47.5
5.1	2.6	3.1	3.3	7.4	5.7	35.5	3.6
60.7	26.8	37.8	16.6	26.1	9.4	8.2	7.3

Source: Vienna Institute for International Economic Studies 2004.

Note: — = not available. BG = Bulgaria; CR = Croatia; CZ = Czech Republic; EE = Estonia; HU = Hungary; LV = Latvia; LT = Lithuania; RO = Romania; RU = Russian Fed.; PL = Poland; SK = Slovak Rep.; SI = Slovenia; UK = Ukraine.

a. Data are for 2002.

b. Data are for 2000–02.

c. Covers all industry, including mining and energy.

d. Includes hotels and restaurants.

e. Includes finance and business services.

f. Excludes utilities.

bureaucratic impediments are more prominent in inhibiting foreign participation. Examples include limitations on foreign staff, lengthy licensing procedures, financial repression, public ownership of major banks, and lax regulatory practices. In general, the banking sector in these countries suffers from a weak capital base.

4.2.2 Infrastructure Services

Policy reforms in utility and infrastructure services include better regulation of the provision of these services, removal of cross-subsidization, more efficient

BOX 4.1 The European Bank for Reconstruction and Development's Services Reform Index

The EBRD index, compiled annually between 1990 and 2004, ranges from 1 (little progress) to 4.3 (most advanced implementation of reform agenda). It is the average of the following indicators:

1. Banking and interest rate liberalization: A 4.3 index means that banking laws and regulations fully converge with Bank for International Settlements standards and a full set of competitive banking services is provided.
2. Securities markets and nonbank financial institutions: A 4.3 index means that securities laws and regulations fully converge with International Organization of Securities Commissions standards and there is fully developed nonbank intermediation.
3. Electric power: A 4.3 index means that tariffs reflect costs and provide adequate incentives for efficiency improvements, there is large-scale private sector involvement in an unbundled and well-regulated sector, and the sector is fully liberalized, with well-functioning arrangements for network access and full competition in generation.
4. Railways: A 4.3 index means that infrastructure is separated from operations and freight from passenger operations; full divestment and transfer of asset ownership, including infrastructure and rolling stock, has been implemented or is planned; and the rail regulator has established and implemented access pricing.
5. Roads: A 4.3 index means that road administration has been fully decentralized; road maintenance operations have been competitively commercialized and awarded to private companies; road user charges reflect the full costs of road use and associated factors, such as congestion, accidents, and pollution; there is widespread private sector participation in all aspects of road provision; and there is full public consultation on new road projects.
6. Telecommunications: A 4.3 index means that the sector is effectively regulated by an independent entity; a coherent regulatory and institutional framework deals with tariffs, interconnection rules, licensing, concession fees, and spectrum allocation, and a consumer ombudsman is in place.
7. Water and wastewater: A 4.3 index means that water utilities are fully decentralized and commercialized; a fully autonomous regulator exists, with complete authority to review and enforce tariff levels and quality standards; there is widespread private sector participation through service-management-lease contracts; and full concessions or divestiture of water and wastewater services in major urban areas are in place.

Source: EBRD 2004.

pricing, improved revenue collection, and the separation or unbundling of activities. Three types of reforms are particularly important in increasing the efficiency of provision of regulated infrastructure services: allowing entry of new domestic and foreign providers; where feasible, opening the domestic market to imports of such services; and establishing an independent regulator, which is likely to be a key determinant of regulatory effectiveness. Reforms may—and often do—include privatization, but this variable is captured in the overall investment climate variable, not in the infrastructure services policy reform index. Even if incumbent providers remain state owned, if regulators permit entry of new providers in the market, such competition can be expected to yield efficiency gains in the industry overall. The EBRD indexes suggest that countries in Central and Eastern Europe and the Baltics have made the most progress in establishing independent regulators, while many of the countries of the former Soviet Union have made the least progress.

Figure 4.3 disaggregates the infrastructure index along five sectoral dimensions—electric power, roads, railways, telecommunications, and water and wastewater—and assesses the cumulative reform progress in each country. For the region as a whole, progress has been most pronounced in telecommunications

Figure 4.3 Infrastructure Reform, by Country and Sector, 2004

Source: EBRD 2004.

Note: Scale ranges from 0 to 20, representing the progress by each country on the five indexes, each of which ranges from 1 to 4.3 (see box 4.1).

and electrical power, often as a result of a mix of commercialization, deregulation, and privatization of national telecom companies. The index shows little or no progress in utility and infrastructure reform in Turkmenistan, Tajikistan, Belarus, Uzbekistan, and the Kyrgyz Republic, with most progress made in Hungary, Poland, the Czech Republic, Estonia, and Romania.

In the telecommunications sector, fixed-line services are still quite underdeveloped in most countries. This has given rise to faster growth of, and stronger competition in, the mobile services sectors, especially in Central and Eastern Europe and the Baltics, followed by South Eastern Europe. In the rest of the former Soviet Union, mobile penetration rates fall short of fixed-line services. In many of these countries, independent telecom regulators have yet to be established. The incumbent fixed-line operator may oppose interconnection agreements, tariffs are frequently low and distorted, and cross-subsidies between different types of calls and customers continue to be prevalent.

The least progress has been made in the rail, road, and water sectors. Only a few countries in Central and Eastern Europe—Croatia, Hungary, and Poland—have introduced private sector participation through toll roads. Reforms in the railway sector are also at an early stage in terms of private sector participation, although the separation of infrastructure from operations is either planned or has been put in practice in many countries.⁵

FDI is an important channel through which foreign providers can contest infrastructure service markets. FDI in these sectors sometimes takes the form of greenfield investment, but most FDI has come through privatization. The extent of privatization varies substantially by country and sector, with countries in Central Europe and the Baltics attracting the most FDI in infrastructure and countries in South Eastern Europe attracting the least.

Eschenbach and Hoekman (2005) analyze the impact of service sector policy reforms on the growth performance of 24 transition economies. Controlling for a number of standard explanatory variables used in the growth literature (investment, crises, inflation), they find a statistically significant positive association between per capita GDP growth and indirect (FDI) and direct measures of service sector policy reforms (the different policy choice indexes). Although the sample of countries was limited to transition economies—annual policy reform indicators of the type compiled by the EBRD do not exist for developing countries—the findings indicate that policies on services should be considered more generally in empirical analyses of economic growth. Services such as finance, telecommunications, and transport are major inputs into the production of goods and services, including agriculture as well as manufacturing. The costs of these inputs can account for a major share of the total cost of production and are thus important factors affecting the competitiveness of firms. Services are also important

determinants of the productivity of workers in all sectors; education, training, and health services are key “inputs” in the formation and maintenance of human capital. Thus service sector reforms can potentially do much to enhance economic growth and efficiency.

Findings by Eschenbach and Hoekman (2005), Konan and Maskus (forthcoming), and Mattoo, Rathindran, and Subramanian (2005), among others, suggest that a comprehensive behind-the-border policy reform agenda focusing on services can help attract much-needed investment, both domestic and foreign. Openness to foreign competition—through policies that permit foreign participation in domestic markets—is a key element of good service sector policy. There is no good measure available of the multiplier effect of services reform and openness, but the limited stock of inward FDI in Central Asia stands in striking contrast to that in Central and Eastern Europe and the Baltics. So is the overall economic performance of these countries, measured in terms of either average performance or its volatility. Liberalization—greater participation by foreign service firms on domestic markets—is, of course, not sufficient. Given the characteristics of services and services markets—often affected by asymmetric information or high fixed costs and associated barriers to entry—there is also a need for effective regulatory supervision of both domestic and foreign operators. This is a significant challenge. Given that countries in Central and Eastern Europe, the Baltics, and increasingly South Eastern Europe now offer relatively attractive policy environments for FDI and have done much to converge on OECD regulatory standards in services, the policy reform benchmark for Central Asian and other transition economies has risen.

The Doha Round negotiations on services offer an opportunity to pursue additional service sector reforms. The rest of this chapter explores what transition economies have done to date in the GATS and what the relationship is between commitments and actual reforms.

4.3 Transition Economies and the Patterns of GATS Commitments

To compare the summary indicators of actual policy with the GATS commitments of transition economies, it is necessary to convert these commitments into an index. Annex table 4A.1 summarizes the methodology used (based on Hoekman 1996). Actions are divided into three categories: free, partial, and unbound. Free commitments set no limitations on foreign suppliers with respect to market access and national treatment (that is, they do not discriminate against foreign suppliers). Partial commitments include a specific commitment implying that restrictions are imposed. Unbound refers to cases in which no commitments are

TABLE 4.4 Indexes and Rankings of Countries Based on Average Share of "Free" Sectors

Group (a) EU accession in 2004, GATT members		Group (b) EU accession in 2004, non-GATT members	
Country	Percentage of free sectors	Country	Percentage of free sectors
Hungary	43.4	Latvia	58.1
Slovak Republic	28.4	Lithuania	42.3
Czech Republic	27.8	Estonia	38.2
Poland	21.2	Slovenia	27.7
Average	30.2	Average	41.6

made. This does not imply that the country is actually closed in a sector or mode of supply, just that it is not constrained by the GATS. One of the objectives of the analysis that follows is to determine whether there is a general tendency for unbound sectors to be rather closed.

The 16 countries are divided into four groups: (a) EU accession countries that were General Agreement on Tariffs and Trade (GATT) members in 1994; (b) EU accession countries, including the Baltic countries, that were not GATT members in 1994; (c) South Eastern European countries; and (d) countries other than the Baltic countries that belonged to the former Soviet Union. Annex figures 4A.1–4 show the distribution of commitments across the three categories across the 155 GATS subsectors. Each of the three bars for the four modes of market access and national treatment represents the percentage of subsectors for the categories free, partial, and unbound.⁶ The average of these shares is used for the "free" category across the two times four modes as an indicator of scheduled openness (commitments).

In group (a)—the Czech Republic, Hungary, Poland, and the Slovak Republic—the schedules took effect in 1994 and have been revised several times since then (annex figure 4A.1). These revisions, like those implemented by other countries, concern mainly additional commitments in the financial services and telecom sectors. The information presented in the annex figures is based on the most recent revisions. The averages are somewhat biased downward by the fact that mode 4 is usually part of the horizontal commitments and therefore shows up as unbound in the charts. Hungary has the most sectors without limitations, with an average share across modes of about 43 percent, followed by the Czech Republic and the Slovak Republic, with about 28 percent each, and Poland, with roughly 21 percent. The relatively low degree of commitment to opening up in the Czech

TABLE 4.4 (Continued)

Group (c) South Eastern Europe, potential EU candidates		Group (d) Former Soviet republics, not potential EU candidates	
Country	Percentage of free sectors	Country	Percentage of free sectors
Croatia	44.6	Kyrgyz Republic	49.3
Macedonia, FYR	41.5	Georgia	46.5
Romania	24.3	Moldova	42.6
Bulgaria	21.9	Armenia	39.9
Average	33.1	Average	44.6

Source: Author's interpretation of GATS schedules.

Republic, the Slovak Republic, and Poland is surprising at first sight, as all three were preparing to join the European Union at the time of submitting the schedules. The high percentage of unbound commitments is also striking.

The four other EU accession countries that were not members of the GATT in 1994, (group b) convey a different impression (figure 4A.2). Latvia is the front-runner, with about 58 percent "free" sectors on average, followed by Lithuania (42 percent) and Estonia (38 percent). The outlier is Slovenia, where about 28 percent of the 155 sectors have no limitations on average. The schedules date from 1995 (Slovenia); 1999 (Estonia and Latvia); and 2001 (Lithuania).

In group (c) Croatia accounted for 45 percent and the former Yugoslav Republic of (FYR) Macedonia for 42 percent of all sectors committed as "free" (figure 4A.3), substantially more than Romania (24 percent) and Bulgaria (22 percent). The schedules were submitted in 1994 (Romania), 1997 (Bulgaria), 2000 (Croatia), and 2004 (FYR Macedonia).

The four former republics of the Soviet Union group, (d), all committed themselves to a rather high degree of market opening and nondiscrimination. The Kyrgyz Republic is the leader, with 49 percent of all sectors "free," followed by Georgia (47 percent), Moldova (43 percent), and Armenia (40 percent) (figure 4A.4). The schedules were submitted in 1999 (the Kyrgyz Republic), 2000 (Georgia), 2001 (Moldova), and 2004 (Armenia).

Table 4.4 summarizes the patterns in the commitments made by the 16 transition economies. Three interesting results emerge. First, among the EU accession countries, countries that were not members of the GATT in 1994 seem to have done a lot more in terms of commitments than the countries that were GATT members, with the average share of sectors committed to full liberalization more

than 10 percentage points higher. Poland's weak use of the GATS as a liberalization device is particularly striking. Hungary and Slovenia are the outliers. The Baltic countries clearly signal a strong interest in the GATS mechanism.

Second, among the four South Eastern European countries, only the former Yugoslav republics reveal a strong interest in committing themselves to liberal policies. Although all of the countries are potential EU candidates, Romania and Bulgaria were and are more advanced in the accession process, suggesting that the GATS may have been less relevant for them.

Third, the four former Soviet republics, three of which are in the Central Asia/Caucasus area, are highly committed to liberalization. The average of about 45 percent "free" sectors is the highest of all four country groups.⁷

These findings raise several questions. First, do the schedules reflect actual commitments to lock in a set of reform agendas for the services sector, or are they just a signaling device, an indication of intent? Second, do countries with little revealed interest in making full commitments use discriminatory trade-related policies, or do they simply want to reserve the right to remain unconstrained with respect to their policy choices? If they simply want to remain unconstrained, is there a relationship with the size of the country—that is, a potential terms-of-trade rationale? Third, is the lack of GATS "interest" due to other factors, such as the need to implement the EU *acquis*? Finally, to what extent are commitments actually applied? The weaker the relationship between commitments and actual policies, the greater the doubts that can be expressed regarding the enforcement mechanisms of the GATS and thus its usefulness as a commitment device.

4.4 Empirical Assessment of the Political Economy of GATS Commitments

There are two general explanations for the existence of trade agreements. The market access explanation is that agreements are a way of internalizing policy spillovers, foreign policies that affect a country's terms of trade. The domestic political economy explanation is that agreements are a vehicle for mobilizing domestic support for desirable national reforms and locking in such reforms.⁸ GATS commitments by a transition economy are more likely to reflect the second motivation. However, in assessing possible explanations for the observed pattern of GATS commitments, account needs to be taken of explanatory factors such as geographic proximity to a large market (the European Union), the size of the economy, and engagement in the EU accession process. Countries may have a greater incentive to use the GATS as a signaling device if they are small, geographically distant from large markets, and lack any prospect of joining the European Union. It is unclear, however, whether these countries want to use the GATS to lock in policy or merely signal willingness to become a "member of the club."

Figure 4.4 Time Path of Service Sector Reform

Source: EBRD 2004.

This section begins with an aggregate analysis of the extent to which GATS commitments by the four country groups match actual policies. It then examines whether country characteristics may have some explanatory power.

Figure 4.4 gives an impression of the quality of service sector reform in the four country groups. The data are averages of the country scores measured by the EBRD, presented at the group level. The country scores are averages across a larger number of service sector activities (see box 4.1). In terms of policy, group (a) has consistently performed best over the whole transition period, followed by groups (b), (c), and (d). If, however, we rank the country groups on the basis of GATS commitments, the ranking of groups (a) and (d) is reversed, while the ranking of groups (b) and (c) remains unchanged (table 4.5). The first main finding is thus

TABLE 4.5 Openness Rankings of Country Groups, in Theory and in Practice

Rank	Theory	Ranked by average "free" sectors	Practice	Ranked by average EBRD score
1	Group (d)	44.4	Group (a)	2.68
2	Group (b)	41.6	Group (b)	2.41
3	Group (c)	33.1	Group (c)	2.01
4	Group (a)	30.2	Group (d)	1.70

Sources: EBRD 2004 and author's calculations based on GATS schedules.

Figure 4.5 Time Path of Service Sector Reform by Country, 1990–2004

Source: EBRD 2004.

the reversed positions of the extremes in the rankings. I turn later to why this may be the case.

There is, of course, much more heterogeneity in the data. It is therefore useful to look at the different groups individually (figure 4.5). I do not discuss the results for all countries but rather examine some interesting outliers. In line with its GATS commitments, Hungary is the frontrunner in group (a) in terms of applied policy, as measured by the EBRD indexes. More surprising is the solid performance of Poland, which did not make much use of the GATS. In group (b) the four countries stay relatively close to one another in terms of policy performance. Estonia fares best, while Latvia's strong use of the GATS is not fully reflected in the

policy indicator. In group (d), Bulgaria, Croatia, and Romania follow more or less the same policy path, while FYR Macedonia has been stagnating since the mid-1990s. This does not fully reflect the picture painted by GATS commitments, where Bulgaria and Romania did very little in terms of committing to opening up. In terms of applied policy, the pattern is the opposite. This is also true for FYR Macedonia, a GATS frontrunner, and Croatia. Theory and practice thus seem to be reversed for these three countries. Croatia is the outlier, in that it performs well in terms of both commitments and applied policy. Striking in group (d) is the poor performance of the Kyrgyz Republic. The frontrunner in terms of GATS, it has been lagging on actual policy for about seven or eight years.

What does all this suggest about the political economy of making commitments in the GATS? The interesting finding here is the reversal in rankings of groups (a) and (d) in terms of policy as opposed to GATS commitments. Group (a) has the following characteristics: the countries are located close to the European Union, they all joined the European Union in 2004, they were all GATT members in 1994, and they have heterogeneous market sizes. The fact that on average their policy performance is inversely related to their GATS commitments suggests that they relied on other mechanisms, in particular the EU *acquis*, as a focal point and lock-in mechanism.

Group (d) is geographically distant from the European Union, its markets are homogenously small, and there is no prospect of EU accession. These factors explain to some extent the difference in the observed use of the GATS. The low ranking of these countries in terms of policy suggests that they may be using the GATS as a signaling device rather than as a means of locking in reforms. Among this group of countries, the motivation seems to have been the desire to “join the club” rather than to reinforce domestic reforms. An obvious question or counter-argument is that if GATS commitments have been made, presumably they are binding. In practice, however, it is unlikely that GATS commitments are (or are perceived to be) binding, as the very small markets involved and their distance from major markets imply that the incentives to launch dispute settlement cases against these countries are low. Thus it may well be that governments in these countries may not be committed to liberalization but still make what appear to be significant commitments in the GATS.

On average, commitments by groups (b) and (c) seem in line with actual policy. These countries also have somewhat smaller markets on average than group (a). Group (c) is too heterogeneous to be discussed at the aggregate level.

Turning to the country level, Poland, the largest market with geographic proximity to the European Union, previous GATT membership, and membership in the European Union, has done the least of all countries in the GATS. It is a good example of a country that does not “need” the GATS. To a lesser extent this holds true for

the Czech Republic and the Slovak Republic as well. In contrast, Hungary used the GATS—perhaps to attain “frontrunner” status as well as help lock in reforms.

In group (b), the Baltic countries used the GATS to indicate their commitment to implementing and locking in reforms. This may partly be due to their small markets and the fact that they once belonged to the Soviet Union and were not members of the GATT in 1994. Apparently, they do not rely on the EU accession process alone, as Slovenia appears to do.

In group (c), Romania and Bulgaria do very little in the GATS, seeming instead to rely on their potential EU accession, market size, and geographic proximity to Western Europe. For Croatia EU accession is an ambitious target, given its involvement in the war in the Balkans. This may help explain why it made use of the GATS to commit itself to a reform process. FYR Macedonia shows no willingness or ability to convincingly implement a domestic reform agenda.

Countries in group (d) appear to commit to market opening in order to signal commitment to rather than implement reform. The Kyrgyz Republic’s commitment to market opening in the GATS is as striking as its failure to implement a domestic reform agenda (as measured by the EBRD indexes).

On the whole, this analysis suggests that the 16 countries can be divided into three categories. The first includes the countries that have joined or have prospects of joining the European Union. These countries are more open than their GATS commitments suggest. They have large markets, previous GATT membership, and geographic proximity to the European Union. These countries do not need the GATS as a liberalization device. In this group Poland is a key player, but Bulgaria, the Czech Republic, Romania, the Slovak Republic, and Slovenia, also belong in this group.

The second group is composed of countries that are relatively open in both theory (GATS indexes) and practice (EBRD indexes). They may or may not need the GATS, but they seem to use it to signal frontrunner status (Hungary), because they have small markets (the Baltics), or want to lock in reforms (Croatia). Croatia is probably the only country in this group that actually “needs” the GATS, because it faces greater uncertainty regarding future EU membership. Most countries in this group were not members of the GATT previously (the exception is Hungary), which provides them with an additional motivation to align GATS commitments and actual reforms. An important reason for this is that new WTO members have been subjected to much greater pressure to make far-reaching commitments than incumbents (see, for example, Hoekman and Kostecki 2001).

The third group is composed of countries that are less open in reality than they would appear to be on the basis of GATS commitments. This group includes Armenia, Georgia, the Kyrgyz Republic, Moldova, FYR Macedonia, and the

former Soviet republics. These countries have no or very little chance of joining the European Union. They are geographically or culturally distant from the European Union, have small markets, and were not GATT members in 1994. They use the GATS to signal their interest in membership in the world trading system without convincingly implementing a related reform agenda. For them the GATS is a pure signaling device, used to benefit from membership in the world trading system.

To what extent are actual policies less liberal than GATS commitments? The fact that the rank order of countries changes when EBRD policy performance rather than GATS commitments is used suggests that the GATS enforcement mechanisms may not be very effective. It is difficult to say whether this is indeed the case, as there is no information on whether foreign suppliers have had problems with inadequate implementation of GATS commitments in certain countries. These countries may attract very little foreign suppliers for other reasons (market size, political instability), making it less likely that their GATS commitments will be put to a legal test. What can be said is that an unbound commitment does not necessarily imply that countries concerned are closed. The example of Poland shows that actual policy may be much more liberal than the GATS commitments suggest is the case.

4.5 Concluding Remarks

Services such as finance, telecommunications, and transport are major inputs into the production of goods and services, including agriculture and manufacturing. The costs of these inputs can account for a major share of the total cost of production and are thus important factors affecting the competitiveness of firms. Services are also important determinants of the productivity of workers in all sectors—education, training, and health services are key “inputs” into the formation and maintenance of human capital. Thus service sector reforms can potentially do much to enhance economic growth and efficiency.

Given the increasing importance of the service sector, its role in trade negotiations has become a major issue for policy makers. The GATS is the primary multilateral instrument that can be used to improve access to markets and lock in (promote) pro-competitive policy reforms. The ability of the GATS to promote liberalization on a reciprocal basis has been questioned in the literature (see, for example, Hoekman and Messerlin 2000). There are strong forces that should support unilateral policy reform efforts, and reciprocity within services may be hard to obtain. Small countries in particular will have little to offer. Clearly, however, there can be (and is) resistance to domestic reform. A primary function of trade

agreements is to overcome such opposition, perhaps with the quid pro quo being sought in other sectors.

The data analyzed in this chapter suggest that discussions of the role of trade agreements need to distinguish between deep regional integration of the EU type and more shallow commitment mechanisms, such as the GATS. Most countries do not have any prospect of joining the European Union. These countries can emulate transition economies that, like Croatia, made use of the GATS to help lock in reform agendas. They should not emulate transition economies that appear to have tried to use the GATS merely as a signaling device. Such efforts might appear to be a sensible way of reaping the fruits of membership in the international trading system without incurring major policy constraints. The problem with this strategy is that it generates no payoffs, as investors focus on actual policies.

Perhaps a more important problem with the observed pattern of commitments versus real policies is that because of lack of or weak enforcement, GATS commitments may not be of great value to small countries. Where this is the case, it puts the burden squarely on the shoulders of domestic reform and national governments. An implication is that calls for more offers to be submitted in negotiations over services may not have very significant payoffs to those who make them.

Notes

1. Most of the quantitative analyses of the impact of services policy reforms have used static applied general equilibrium models and found that services policies are important for welfare. See, for example, Konan and Maskus (2005) and the references cited there.

2. According to Bičanić and Škreb (1991), less than 1 percent of the labor force was employed in finance and insurance.

3. What follows draws on Eschenbach and Hoekman (2005).

4. Aggregate data on FDI inflows are available for a wider set of countries, but they are not broken down across services sectors.

5. In terms of actual reform measures, a few examples are worth mentioning. Estonia has fully privatized its railway system. Network maintenance is carried out privately in the Czech Republic, Kazakhstan, Poland, and Romania. Passenger services are not profitable in many transition economies and are in general subsidized. In the Czech Republic, Latvia, and Romania, the operation of some passenger services has been handed over to private companies. In Kazakhstan, Poland, Romania, and the Russian Federation, private rail freight services have developed following gradual liberalization in this area (see Eschenbach and Hoekman 2005).

6. Trade in services may occur through cross-border trade; consumption abroad (for example, tourism); commercial presence (FDI); or the temporary movement of people providing services to clients abroad.

7. This is a conservative measure for Georgia, the Kyrgyz Republic, and Moldova, as only sectors that are explicitly “free,” not those mentioned in the schedule but not clearly identified (that is, empty spaces under the relevant headings), are counted. Strictly speaking, the latter also comply with the definition of “free,” so that the degree of liberalization could be higher. For all other countries there is no difference.

8. See Bagwell and Staiger (2002) on the market access explanation and Tumlir (1985) on the domestic political economy explanation.

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ANNEX

TABLE 4A.1 Classification of GATS Commitments

GATS terminology	Term used in figures
None	Free
None, except specific services or provisions	Partial
Unbound, except specific services or provisions	Partial
Unbound, except as indicated in horizontal section, plus textual description of bound commitments	Partial
Unbound, due to lack of technical feasibility, except specific services	Partial
Textual description of bound commitments	Partial
Unbound	Unbound
Unbound, except as indicated in horizontal section	Unbound
Unbound, due to lack of technical feasibility	Unbound
Empty space, sector not mentioned in schedule	Unbound

Source: Author's definitions.

Figure 4A.1 Allocation of Commitments across 155 GATS Sectors in the Czech Republic, Hungary, Poland, and the Slovak Republic

Source: Author's interpretation of GATS schedules.

Figure 4A.2 Allocation of Commitments across 155 GATS Sectors in Estonia, Latvia, Lithuania, and Slovenia

Source: Author's interpretation of GATS schedules.

Figure 4A.3 Allocation of Commitments across 155 GATS Sectors in Bulgaria, Croatia, FYR Macedonia, and Romania

Source: Author's interpretation of GATS schedules.

Figure 4A.4 Allocation of Commitments across 155 GATS Sectors in Armenia, Georgia, the Kyrgyz Republic, and Moldova

Source: Author's interpretation of GATS schedules.

PART II

DEVELOPMENT AND THE TRADE REGIME

SPECIAL AND DIFFERENTIAL TREATMENT IN THE WTO: WHY, WHEN, AND HOW?

Alexander Keck and Patrick Low

In one form or another, special and differential treatment (SDT) has been a defining feature of the multilateral trading system for most of the postwar period. The battle to establish the principle that a set of uniform multilateral rights and obligations among a deeply diverse set of nations could not serve the best interests of all parties was won a long time ago.

The current SDT debate occasionally gives the impression that some beneficiary governments want to fight that battle again. The impulse may stem from frustration—from the sense that more advanced countries in the system are unresponsive to the real needs of developing countries. It may also reflect a reluctance or inability to engage in debate and undertake analysis at a level of detail and specificity that is indispensable to a worthwhile outcome.

The World Trade Organization (WTO) is an international agreement subscribed to by more than 144 governments with widely differing priorities, presiding over economies with widely divergent characteristics. If accommodation on the key issue of how these divergences are to be managed in the common interest eludes its members, the system itself will be under threat. Its multilateral character and all the benefits flowing from a “universalist” vision will be vulnerable. In the immediate context, better understandings among members on how to define SDT

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and manage the question of which members should have access to it seem to be an indispensable condition of success in the Doha negotiations.

This chapter seeks to address key aspects of what has become an increasingly entangled and multifaceted discussion.¹ Section 5.1 begins by reviewing briefly the historical context in which the relationship of developing countries with the multilateral trading system evolved. The historical perspective may help in explaining how the lines of the debate are drawn today. Section 5.2 identifies five elements in the case typically made for SDT: a political right, a right to preferential market access, a right to additional levels of import restriction, a right to export subsidies otherwise prohibited, and a right to flexibility in the application of a range of nontariff, or “behind-the-border,” rules. On the basis of these distinctions, section 5.3 explores various elements of SDT and develops arguments for particular approaches to designing and managing access to SDT. Section 5.4 summarizes the chapter’s conclusions.

5.1 A Brief History of Special and Differential Treatment

An appreciation of the evolution of provisions designed specifically for developing countries in the multilateral trading system provides a helpful perspective in considering the issue of SDT in the context of the Doha Agenda. Four phases can usefully be distinguished.² The first phase is from the creation of the General Agreement on Tariffs and Trade (GATT), in 1948, to the beginning of the Tokyo Round, in 1973. The second phase is the Tokyo Round itself (1973–79). The third phase is from the end of the Tokyo Round to the end of the Uruguay Round (1979–95). The fourth phase is from the end of the Uruguay Round until the present. These phases were chosen because each encompasses significant events and tendencies in relation to the participation of developing countries in the multilateral trading system.

The first phase was dominated by market access questions, in particular the conditions of access for developing country exports to developed country markets. A notable landmark during this period was the 12th Session of the GATT Contracting Parties, held at the ministerial level in 1957. At that meeting, agricultural protectionism, fluctuating commodity prices, and the failure of export earnings to keep pace with import demand in developing countries were identified as undesirable features of the international trading environment. A panel of experts, chaired by Professor Gottfried Haberler, was established to examine trends in international trade in light of these concerns.

The 1958 Haberler Report confirmed the view that export earnings in developing countries were insufficient to meet development needs. The report focused primarily on developed country trade barriers as a significant part of the problem,

although it also criticized some developing country trade barriers. In response to the report, GATT Contracting Parties established three committees to develop a coordinated Programme of Action Directed Toward an Expansion of International Trade. Committee III focused on barriers to exports maintained by developed countries. By 1963 it had drawn up an eight-point Plan of Action, which called for, among other things, a freeze on all developed country trade barriers on products of interest to developing countries and the removal of all duties on tropical and other primary products. The Plan of Action became part of the Kennedy Round (1964–67) and was never implemented to a significant degree. The impression of repetitious similarity between what was happening in this area 40 years ago and the discussion today is unavoidable.

On the institutional front, the shift in development thinking initiated by the Prebisch-Singer thesis was enshrined in the United Nations Conference on Trade and Development (UNCTAD), established in 1964.³ The birth of UNCTAD; the growing number of newly independent states following decolonization in Africa, Asia, and the Caribbean; the Cold War; and the success of developing countries in placing their issues center stage in the GATT all contributed to the decision to establish Part IV of the GATT in 1965.⁴ Part IV consisted of three articles on trade and development.⁵ While designed to promote development and developing country interests in the trading system, Part IV was never more than a set of “best endeavor” undertakings with no legal force—a fact that has been the source of dissatisfaction among many developing countries to the present day. One particularly significant feature of Part IV, however, was the assertion of the principle of nonreciprocity, in Article XXXVI:8. Nonreciprocity meant that in the course of trade negotiations, developing countries would not be expected to make contributions inconsistent with their individual development, financial, or trade needs. Nonreciprocity has never been more clearly defined than that, and just like the later and closely linked concept of SDT, a definition of reciprocity has eluded the precision that might have averted some of the debates that continue to dominate the discussion of developing country participation in the trading system.

By the time of the second phase in the evolution of this debate (the Tokyo Round, 1973–79), the pendulum in trade policy discussions had started to swing away from import substitution toward greater export orientation. The inherent limitations and trade-distorting effects of excessive reliance on import substitution were becoming better understood. The move toward a more neutral stance with respect to trade policy incentives implied opening up more to import competition as well as removing the policy bias against exports. From the institutional perspective, Part IV already presaged this second aspect of the trade and development debate in the GATT, which was to focus increasingly on developing countries’ own trade policies as well as market access for their exports. This tendency,

coupled with a strong emphasis on nontariff trade measures in the Tokyo Round, distinguishes the second phase from the first.

Much of the negotiating involvement of developing countries in the Tokyo Round aimed at limiting the extent to which the new agreements (the Tokyo Round “codes”) on nontariff measures would impose policy limitations or undue administrative or financial burdens on developing countries. This objective, together with continued insistence on the importance of nonreciprocity in market access negotiations, led to three principal results for developing countries. First, developing countries agreed to limited market access commitments and to relatively few tariff bindings. Second, the “code approach” was adopted with respect to the new nontariff measure agreements, meaning that the agreements applied to only signatories. Many developing countries refrained from signing the various codes, which covered technical barriers to trade, customs valuation, import licensing, subsidies and countervailing measures, antidumping, and government procurement.

Third, a new framework was established to define and codify key legal rights and obligations of developing countries under the GATT. The 1979 Decision on Differential and More Favourable Treatment, Reciprocity and Fuller Participation of Developing Countries, also known as the Enabling Clause, provided permanent legal cover for the generalized system of preferences (GSP), for SDT provisions under GATT agreements, for certain aspects of regional or global preferential agreements among developing countries, and for special treatment for least developed countries (LDCs). The Enabling Clause also restated the principle of nonreciprocity, as first spelled out in Part IV, and stated that developing countries expected their capacity to make contributions or negotiate commitments to improve with the progressive development of their economies and improvement in their trade situation. This was the origin of the notion of “graduation.”

Some commentators lauded the flexibility that the Tokyo Round results afforded developing countries, believing it supportive of their development needs. Others considered that the degree of nonengagement implied by these arrangements meant that developing countries gained little from the system. This argument was based on two points—that the GATT did not support developing countries in the formulation of better trade policies and that because developing countries offered as little as they did in the negotiations, they received little in return from their trading partners. The problem with both these positions, which tended to inform a good deal of the debate during the post-Tokyo Round years, is that they oversimplified reality by failing to distinguish adequately among the dozens of developing countries in the system that faced very different situations and had very different needs. This is a tendency that has persisted to the present and underlies some of the difficulty that the WTO is currently experiencing in its efforts to address SDT issues.

The third phase in the evolution of developing countries in the trading system saw a change in direction in the SDT debate. By the end of this period, in 1995, when the Uruguay Round was completed, developing countries had assumed a much higher level of commitments within the system than ever before. A number of factors explains this trend. First, some developing countries, particularly in Asia and to some degree in Latin America, had enjoyed rapid growth and had succeeded in diversifying their economies. This made them better equipped to participate more fully in the trading system and changed the nature of their interests in international negotiations.

Second, the 1980s opened with a significant realignment in economic thinking in some major economies, especially the United States. This new thinking, while not always pursued consistently by the large trading nations in the trade policy field, nevertheless militated against government intervention and emphasized the role of markets, including for development.

Third, a sense emerged that the trading system itself needed fixing. The system was trying to confront the challenge of contingency protection provisions, with the increased use of voluntary export restraint arrangements. Regionalism was appearing on the trade policy scene in a more significant way, and governments were concerned about the multilateral consequences of this development. Some governments felt it was time for the GATT to tackle agriculture, something it had failed to do during the 40 years of its existence. Similar sentiments applied in the case of textiles and clothing. In addition, some developed country governments wished to see the trading system encompass new areas, in particular investment, trade in services, and intellectual property rights. The idea that developing countries ought to assume higher levels of obligation within the system was also increasing in currency.

The Single Undertaking of the Uruguay Round meant that all WTO members had to accept all agreements. This was in sharp distinction to the code approach of the Tokyo Round.⁶ This alone created important new developing country commitments within the system. Many developing countries significantly increased their tariff bindings, especially in agriculture. In addition, new agreements in services and intellectual property applied to all.

The fourth phase began with a significant challenge for developing countries, as they prepared to absorb their new Uruguay Round obligations legislatively and administratively (in many instances, developing countries were accorded phase-in periods for the assumption of new obligations). This period also began with a sense among many developing countries that they had not been given an adequate opportunity to participate in the closing stages of the Uruguay Round and had been presented with a *fait accompli*, particularly as a result of the Single Undertaking. Linked to this feeling of exclusion was the conviction that not all of the

obligations assumed under the Uruguay Round package were consistent with national economic interests and development priorities.

Discussions have been held in different contexts over the past few years on how to improve the internal working methods of the WTO in order to ensure that all parties that wish to participate in negotiations and decisionmaking are able to do so. This matter is very important and will continue to be discussed, but it does not explicitly form part of the Doha Agenda. On the policy side, however, the “implementation” debate was soon engaged and became a major element in the discussions at Seattle, at Doha, and beyond. Two distinct elements inform the implementation discussions. One concerns the difficulty some developing countries are encountering as they seek to implement their obligations, bearing in mind the costs, administrative aspects, and human capital requirements of doing so. Efforts are being made to address this aspect of implementation through augmented technical assistance and capacity building efforts. The other aspect of implementation relates to the substantive provisions of various WTO agreements. Developing countries are seeking modifications to many provisions on the grounds that they need to be made more supportive of development, less restrictive with respect to the degree of policy flexibility afforded to developing countries, or both.

Some progress was made on implementation issues at Doha, but elements of this discussion are continuing. At Doha another exercise was launched, focusing specifically on making SDT provisions more effective. At the same time, paragraph 44 of the Doha Declaration calls for a review of all SDT provisions “with a view to strengthening them and making them more precise, effective and operational.” Both implementation and SDT discussions have been the focus of many hours of meetings, and many issues remain unresolved.

5.2 What Is the Case for Special and Differential Treatment?

Discussions on SDT have evolved into a web of propositions upon which the case for differentiated GATT/WTO provisions has been built over the years. The astonishing array of proposals for new and improved SDT provisions currently on the table must be disentangled in order to understand and evaluate the underlying rationale of the proposals. The analysis that follows distinguishes five arguments that have been advanced for SDT treatment:

- SDT is an acquired political right.
- Countries should enjoy privileged access to the markets of their trading partners, particularly the developed countries.

- Developing countries should have the right to restrict imports to a greater degree than developed countries.
- Developing countries should be allowed additional freedom to subsidize exports.
- Developing countries should be allowed flexibility with respect to the application of certain WTO rules or be allowed to postpone the application of rules.

Many of the SDT proposals currently under consideration in the Doha negotiations and work program fit into one of the categories in this taxonomy. Some, however, do not. The provisions falling outside the designated categories are those that entreat WTO members to take or prioritize action favoring developing country trade interests, to refrain from new actions that prejudice those interests and provide technical assistance to developing countries. The key characteristic of these provisions is that their effectiveness depends on the willingness of governments to take action or refrain from doing so, not on legally enforceable commitments. This essentially voluntary character of certain provisions intended to benefit developing countries is usually obvious from the language in which they are couched.

Article XXXVII:3 of GATT 1947, for example, states that developed countries shall “give active consideration to the adoption of other measures designed to provide greater scope for the development of imports from less-developed contracting parties.”⁷ The same article says that developed countries shall “have special regard to the trade interests of developing contracting parties when considering the application of other measures permitted under this Agreement to meet particular problems.” It is difficult to see how these “best-endeavor” provisions could be given legal force through dispute settlement. Should such provisions be considered as substantive components of SDT? The answer is probably yes, simply because the provisions are devoid of legal security and do not offer an opportunity, beyond moral suasion, for putative beneficiaries to insist on their enforcement.

In paragraph 12(i) of the Doha Decision on Implementation-Related Decisions and Concerns, developing countries sought to address this question. The mandate calls for members “to identify those special and differential treatment provisions that are . . . nonbinding in character, to consider the legal and practical implications. . . . of converting [them] into mandatory provisions, [and] to identify those that members consider should be made mandatory.” Although this was supposed to have been accomplished by July 2002, agreement has proved elusive. Even for the limited number of proposals on the table with respect to which agreement may be forthcoming as the Doha negotiations proceed, it remains far from clear whether a significant number of best-endeavor provisions will be converted into meaningful mandatory SDT obligations as a result of the exercise.

Some best-endeavor provisions simply could not be made mandatory without creating legal nonsense. Progress has also been limited because developed countries appear to have been reluctant to consider changing the balance of legal rights and obligations under any agreement outside the framework of negotiations. Developing countries promoting the SDT agenda have been unwilling to prioritize their proposals in order to focus on a smaller number than the six dozen or more on the table. This has rendered difficult an analytical approach to assessing proposals in relation to development needs and has instead made space for a more politicized debate.

For the present purposes, then, provisions of a best-endeavor character are excluded from further discussion. Were developing countries to negotiate successfully for the conversion of nonmandatory provisions into mandatory ones, it is presumed that they would fit within the taxonomy specified above.⁸

Each of the categories will be discussed in turn. Before proceeding, however, one other underlying assumption must be made explicit. The taxonomy established here does not attempt to deal with the question of whether new subjects and areas of responsibility should be added to the WTO's mandate. Much contention has surrounded this issue ever since nontariff measure agreements were negotiated in the Tokyo Round. The challenge of reaching agreement on the scope of the WTO continues today, with a decision imminent on how to approach the four Singapore issues (investment, competition, transparency in government procurement, and trade facilitation).⁹

If rules are properly designed to accommodate divergent national interests, the SDT provisions they contain should respond to development needs and be phased out as countries attain higher levels of development. Many WTO members appear to take the view that all SDT provisions should be transitory, and there is a certain logic to this position in a world of well-designed rules. But if rules are poorly designed and access to SDT is phased out over time, countries may find themselves party to rules they do not consider supportive of their development. That is the main reason for eschewing SDT as a substitute for quality in rules.

A related consideration that will not be analyzed further here is whether developing countries might be offered the opportunity to opt out altogether from particular rules until some future date.¹⁰ While such a possibility may seem alluring at first sight, it carries the risk that countries opting out will have limited influence on the design of new provisions but will later be obliged to live with those provisions.

5.2.1 Special and Differential Treatment as a Political Right

Few would challenge the proposition that the WTO system of rights and obligations would be inequitable if it did not allow for differentiation among members. Equity is fundamentally a moral construct, easy to state in broad political terms. If

the WTO rules are perceived as inequitable, the legitimacy of the system is called into question. But views may differ as to what is equitable. Some might argue, for example, that equity requires equal outcomes, while others would say it is about equality of opportunity. Thus even if acceptance of the principle of equity is virtually universal, this does not take the analysis very far. The same may be said of acceptance of the need for SDT treatment in the rules of the trading system. Simply to affirm that SDT means attenuated obligations and extended rights for developing countries is not to say very much.

Dwelling on the legitimacy of the principle of SDT as a political right tends to frustrate the quest for effective SDT provisions—that is, provisions that respond to the development needs of developing countries. This is because the political “overlay” of the asserted right can crowd out the detailed economic and legal analysis essential to identifying optimal rules. A particular problem arising from a generalized insistence on the political right to enjoy SDT is the tendency to assume that the best contribution the WTO can make to development is to ensure that developing countries assume minimum obligations under the system—the fewer the better. A failure to think beyond the political right to SDT easily leads to this unspoken assumption that less is better than more.

To the extent that developing countries limit their commitment to the system in this manner, they weaken their negotiating position and lessen the degree to which their trading partners are willing to pursue policies that support development. They limit their ability to fashion new rules in a development-friendly manner. They also weaken the scope for challenging elements in the system that are arguably unbalanced, independent of any consideration of SDT.¹¹ Developing countries also forgo the opportunity to use a commitment to WTO obligations as a weapon against narrowly based domestic pressure to pursue policies that do not reflect the national interest.

The best way to ensure that the WTO contributes to development is to move beyond the principle of differentiation to the substance of individual provisions, including in areas where new negotiations are proposed. Increased emphasis in recent years on the need to see trade policy as an integral element of a broader panorama of development policies, rather than as an externally imposed “add-on,” supports such an approach. The core challenge is to link negotiating positions on liberalization commitments, WTO rules, and SDT to a clear and cogently argued identification of development needs and priorities.

Another reflection of a generalized and excessively politicized approach to SDT is the direction that the “graduation” debate has taken. Article XXXVI:8 of GATT 1947 established the principle of nonreciprocity, stating that “developed contracting parties do not expect reciprocity for commitments made by them in trade negotiations to reduce or remove tariffs and other barriers to trade of less-developed contracting parties.” An interpretive note to this provision states that

developing countries “should not be expected, in the course of negotiations, to make contributions which are inconsistent with their individual development, financial and trade needs.” Some 15 years later, paragraph 7 of the Enabling Clause stated that “[L]ess-developed contracting parties expect that their capacity to make contributions or negotiated concessions or take other mutually agreed action under the provisions and procedures of the General Agreement would improve with the progressive development of their economies and improvement in their trade situation and would accordingly expect to participate more fully in the framework of rights and obligations under the General Agreement.”¹²

The entry of graduation into the debate alongside nonreciprocity and differentiated rules was part of the bargain that gave developing countries formal legal cover with respect to trade preferences under the GSP, SDT in nontariff measure agreements, regional trade agreements among developing countries, and the designation of a separate category of LDCs. It is noteworthy that the language on both nonreciprocity and graduation is couched in terms of expectations. The fulfillment or otherwise of an expectation is not a matter that lends itself easily, if at all, to formal legal interpretation. Where supplementary explicit conditions have not been specified at the detailed level of particular provisions, giving legal precision to the broad indications of principle or policy intent, this has merely led to a politicized to-and-fro in discussions.

Some commentators are now arguing for agreement on a specified set of graduation criteria, like those implicit in the United Nations’ definition of LDCs. Two problems arise with this. First, it is very difficult to transform a historically politicized notion such as graduation into a precise policy outcome, especially if it is presented in binary terms across the entire legal edifice of the WTO. The GATT/WTO has never been able to agree on a definition of developing countries, so it is difficult to see how countries would now agree to being graduated. Even countries such as Mexico and the Republic of Korea, which have joined the Organisation for Economic Co-operation and Development (OECD), are unwilling to change designation, whether or not they are making use of SDT provisions, because of the political overlay associated with country status in the WTO.

Second, such an approach applies a blunt instrument where subtler differentiation is more suitable. A well-loved aphorism that has entered SDT discussions in recent times is that “one size does not fit all.” This is entirely consistent with a more analytical approach to SDT—one that measures economic need against legal provisions. Graduation specified at the national level, even expressed in terms of carefully constructed economic thresholds, does not sit well with a more analytical focus. Countries should be “graduated” out of access to particular SDT provisions at the level of individual provisions. This could be done by reference to explicit economic thresholds, such as the \$1,000 gross domestic product (GDP) per capita

criterion that determines whether nonLDCs can continue to apply export subsidies to manufactures under Article 27.2(a) and Annex VII of the Agreement on Subsidies and Countervailing Measures. Alternatively, staggered time frames could be negotiated for phasing in obligations. Whether through thresholds and benchmarks or multi-tiered phase-in periods, negotiations on country-specific access to SDT provisions could be more analytically based on development considerations and economic criteria at a disaggregated, provision-specific level. Such negotiations are difficult, but they can help lance the boil of excessive politicization and respond more effectively to real need. This approach to defining access to SDT, discussed below, constitutes a core recommendation of this chapter.

Finally, the suggestion has been put forward that a more customized, needs-based approach to SDT could be developed by establishing procedures under which developing countries are given the opportunity on a continuing basis to explain in clear developmental terms why they need access to particular SDT provisions. A decision would then be made on the basis of a judgment as to the quality of the advocacy. This idea certainly pushes SDT arrangements in the direction of responding to the reality that “one size does not fit all,” but it is flawed because of its reliance on a discretionary decision-making mechanism. Who would make the decisions? Could enough technical precision be ensured on a continuing basis to justify decisions as fair and consistent? Politicization could become a larger problem, not a smaller one.

5.2.2 Privileged Market Access

Many developing countries and LDCs enjoy preferential access to markets in developed countries. The first preferential scheme put in place by a number of countries was the GSP, for which a permanent waiver from the nondiscrimination requirement was eventually obtained under the Enabling Clause.¹³ Other schemes limited to a defined subset of beneficiaries include the African Growth and Opportunity Act and the Caribbean Basin Initiative of the United States and the European Union’s Everything But Arms (EBA) initiative for LDCs. Several other developed countries have introduced such schemes.

Much has been written about the utility of preferences to beneficiaries.¹⁴ As Özden and Reinhardt argue in chapter 6 below, a first indication of their rather limited success can be seen in generally low and often decreasing utilization rates, reflecting declining Most Favored Nation (MFN) protection over time, small preference margins, or exclusions from preferential access, including tariff lines that attract high rates.¹⁵ Even where highly protected items are covered and margins are substantial, rules of origin may be prohibitive. Restrictive rules of origin are also more problematic for small countries, which generally face more limited

possibilities to source inputs domestically (Hewitt, Koning, and Davenport 1995). European Union (EU) schemes require that goods be shipped directly to the European Union or remain under the supervision of customs authorities in transit countries. This rule considerably adds to the costs of LDC exporters. All in all, benefits have been highly concentrated among a few countries, with the top 10 beneficiaries, which generally account for 80–90 percent of total imports, receiving preferences under any individual scheme. Despite the significant benefits enjoyed by some countries benefiting from preferential schemes over relatively short periods of time, there is ample reason to caution against relying on a strategy that is fundamentally unstable and carries the seeds of its own demise. The resulting “spaghetti bowl” of trade relationships increases the transaction costs of conducting trade and strengthens vested interests that are hostile to nondiscriminatory liberalization—a theme stressed in chapter 6.

Ultimately, contractually based nondiscriminatory liberalization is likely to be a safer bet than relying on uncertain preferences. Multilateral commitments provide the necessary stability and predictability to act as effective incentives for traders and investors. Conversely, further expansion of trade preferences will result in more countries relying heavily on the unilateral goodwill and policy choices of preference providers. Also, the larger the number of countries seeking preferential treatment and the more similar their export structures, the smaller will be the competitive benefits each country enjoys.¹⁶

Regardless of these considerations, some developing countries continue to attach considerable importance to preferential market access. In the post-Doha discussions, it was proposed that developed countries consult in the Committee on Trade and Development on the products to be covered by their respective preference schemes. Proponents of this idea suggested that developed countries be required to demonstrate that products included are indeed of export interest to developing countries and that meaningful market access is not subverted by non-tariff barriers. Some developing countries went as far as to suggest that the committee set targets for shares in developed country markets.

Preference schemes could doubtlessly be improved in ways that are advantageous for their beneficiaries. But setting target market shares in a political process does not seem a very promising approach, considering the inherent difficulties of such a process and the numerous factors that determine export performance. For instance, for the majority of LDCs, export values to the European Union fell in 2001, when EBA came into effect, due to declining prices for primary exports that could not be compensated for in quantity given domestic supply-side constraints (Brenton 2003).

Although the evidence for preferential market access is mixed, proposals have been made that developed country members bind preferences in their schedules

of commitments on both agricultural and industrial goods. Such bindings would limit future MFN tariff reductions on affected products or influence how parameters are set in the negotiations.¹⁷ The question of binding existing or enhanced preferences for certain groups of countries, such as the African, Caribbean, and Pacific states or small island states, is resisted by other developing countries. Many countries that have not traditionally benefited much from GSP or have been excluded from special preference schemes feel that trade preferences work directly to their disadvantage. They argue that where developing countries are the key exporters, it would be better if preferences under GSP schemes were transformed into bound MFN cuts. Such an approach would have minimal consequences for the direction of trade, while offering greater security of access and lower administrative costs.

5.2.3 Increased Flexibility to Restrict Imports

Broadly speaking, import restrictions can take the form of import tariffs or non-tariff restrictions. Most of the discussion that follows addresses nontariff restrictions. This reflects the fact that tariff levels and decisions about what to negotiate in relation to tariffs are not strictly a matter of SDT. Market access in the negotiating sense is about what developing and developed countries are willing to offer one another by way of a mutually beneficial bargain. Nonreciprocity considerations no doubt form part of the reckoning in regard to the balance of the bargain, and this becomes more explicit if a formula approach is adopted to tariff reductions. Revenue considerations and other factors linked to a country's development policies will also enter the picture, but they will not lead to the same concerns with respect to development relevance as negotiations on rules.¹⁸ It should be noted, however, that much of the discussion below about the role of trade policies in development applies regardless of whether tariffs or nontariff measures are at issue.

Hoekman, Michalopoulos, and Winters (2004) conclude that "trade policy as an instrument to promote industrial development is simply outdated in a world where services are increasingly tradable, there are large FDI flows and, as a result, international production is increasingly becoming fragmented and more and more specialized (503)." They note that an open trade regime provides for "important channels of knowledge transmission, such as exposure to foreign clients, access to technologically sophisticated imports or knowledgeable competitors" (32–33). The reduction of trade barriers extends the market for individual firms, particularly those in small countries. For many developing countries and LDCs, the only way to reach the minimum scale required for sustained growth in output is to integrate with the rest of the world. Access to a larger market makes it easier for a firm

to reach a critical mass of demand, allowing it to exploit economies of scale and further specialize in what it can do best. Moreover, when manufacturers have access to a broad variety of specialized inputs on international markets, their productivity improves, their costs are reduced, and their output increases. Subsequently, they will demand more inputs. As the market grows, room is created for even more specialized producers, costs fall even further, and the virtuous cycle continues.

When barriers to trade fall, becoming part of an international production network presents a significant opportunity for firms in developing countries to upgrade their technology and skills and gain access to the world market through established marketing networks. Linkages of this kind have been instrumental in transforming East Asian manufacturers from unskilled labor-intensive assembly operations of imported intermediates to full-package suppliers for multinational buyers. Some East Asian companies have become multinational buyers in their own right, extending the networks into lower cost, labor-abundant developing countries and LDCs. Some LDCs are already in the process of following suit in upgrading their industries and moving into the higher value-added stages of production.

The phasing out of trade-distorting measures inevitably leads to shifts in sectoral employment and output patterns. This implies that adjustment and transition takes time. But in order for trade liberalization to be beneficial, it is indispensable that it take place according to a preannounced schedule that cannot easily be reversed. Too much flexibility and room for discretion undermine its credibility and sap efforts by exporters and importers to build secure expectations, which are the foundation for expanding operations and economic growth.

5.2.4 Special and Differential Treatment for Trade-Related Investment Measures

Despite reduced enthusiasm for import substitution policies in the 1970s and 1980s, particularly beyond a certain time period and level of protection, successful development is still widely perceived as including economic diversification through the expansion of domestic manufacturing activities. New technologies and a higher skill component in production are commonly seen as important stimulants of growth, spurred through trade. High tariffs on finished products aimed at stimulating domestic production will not always lead to increased domestic value-added. In some industries, components for the production of final goods can be imported as knock down kits, leading to mere assembly operations in the protected sector. An example of this kind of situation would be motor vehicle assembly. However, in the automobile sector many parts involve limited technological components and should be relatively straightforward to produce at home,

thereby increasing domestic value-added and forging backward linkages in local industry. This is why some countries continue to advocate the need for trade-related investment measures (TRIMs), such as local content requirements. These requirements typically allow the producer to choose the specific components to be sourced locally but impose an overall proportion of local content to be achieved. In line with the classical infant industry argument, both the tariffs shielding the final goods industry and the local content threshold would come down over time in order to increase pressure on producers to become competitive.

So much for the theory. Experience suggests that in many instances barriers and distortions persist, local component and finished goods producers remain uncompetitive, and economic growth does not take off. Moreover, TRIMs have immediate drawbacks. While the market guaranteed by local content can be expected to attract investment in the input sectors, higher input prices, more uncertain quality, and other costs of switching suppliers may act as a deterrent to foreign investors in the final goods sector. A partial compensation for their cost disadvantages is, of course, provided through high tariff protection in the domestic market. Given that a protective tariff will cause an antiexport bias in the finished goods sector, export requirements are sometimes introduced subsequently in an attempt to increase production, efficiency, and the overall export orientation of the economy (WTO/UNCTAD 2002). In the form of trade-balancing requirements, export performance is tied to the right to import inputs at reduced tariff rates. While efficiency-seeking FDI with a natural tendency to export may not be affected as much by this form of TRIM, market-seeking investment will be negatively influenced by a requirement to cross-subsidize exports through increased domestic sales or reduced input costs. All forms of TRIMs have comparatively stronger negative effects on foreign direct investment (FDI) in smaller and less developed countries. Investors will often be unwilling to incur the additional costs implicit in TRIMs to gain access to a small market. In sum, in addition to introducing trade distortions, TRIMs have an ambiguous effect on net FDI.

Only one LDC has notified the use of TRIMs to the WTO, but all have sought a total exemption from the TRIMs Agreement in the context of SDT in order to increase their "development space." There are a number of practical reasons to doubt the contribution of TRIMs to economic development, particularly in small, low-income countries. First, TRIMs are predicated on the somewhat dubious assumption that a government is in a position to identify growth sectors with more accuracy than the market, evaluate the appropriate distorting policies, and design corrective measures. Second, TRIMs lead to bureaucratic micromanagement of the industry and high transactions costs for the government and the private sector. Once such schemes are established, they may be very difficult to

remove, because of their lack of transparency and the vested interests of international and domestic firms that rely on them. The TRIMs Agreement is a useful counterweight to such lobby pressures. Finally, despite increasing exports in certain cases, TRIMs do not bring about real export capability and international competitiveness. Because of their inherent incompatibility with open, nondiscriminatory international trade and their distorting effect on FDI, TRIMs may retard technical change, contribute to a misallocation of resources, and ultimately produce costly and inefficient production structures, retarding growth and reducing employment prospects over time.

Should it be easier to protect infant industries? While many countries have already dismantled their TRIMs—or, in the case of the poorest ones, never had such measures in place—the practice of protecting a strategic sector through high tariffs is still very much alive. Traditional infant industry protection, based on the existence of market imperfections and dynamic externalities, also surfaced again in current debates on SDT. A number of developing countries have claimed that nonutilization of GATT Articles XVIII:A and C are evidence of the overrestrictiveness of its requirements. In a bold move, it was proposed that developing countries should be in a position to reject any conditions attached to infant industry protection as too cumbersome. In particular, no compensation should be offered for any modifications or withdrawals of concessions if this were deemed inconsistent with a country's development needs. Another proposal aiming at considerable discretion suggested that protection should last until its objective was achieved. However, it was conceded that compensation/retaliation should be waived only initially. While developed countries seemed ready to exercise restraint in seeking compensation from LDCs under Article XVIII: A and C provisions, they were opposed to changing the compensation rules. In addition, some other developing countries were not ready to provide flexibility to LDCs if they were not entitled to the same treatment themselves.

Considerable doubts remain in the minds of some members as to whether action under Sections A and C of Article XVIII should be made less conditional. Many countries have bound tariffs at high ceiling rates, so that recourse to GATT Article XVIII:A may not be necessary to raise applied rates. Measures taken under Section C typically take the form of quantitative import restrictions. Risks of distortions and suspension of market processes may explain why Section C is considered a matter of last resort, allowed only when action under Section A would be unsatisfactory or ineffective. A number of flexibility elements exist. Under the 1979 Decision on Safeguard Action for Development Purposes (GATT 1980, 209–10), developing countries have the possibility of introducing quantitative restrictions on a provisional basis with immediate effect.

Article XVIII also specifies that protection to a “particular industry” is defined not only as a new industry but also as a new branch of an existing industry or the substantial transformation of an existing industry (GATT, Interpretative Note Ad Article XVIII, para. 2). If infant industry protection is to be granted on grounds of market imperfections and dynamic external economies of scale, two conditions that could be attached to such measures are worth bearing in mind. First, a timetable for the reduction and eventual elimination of restrictions should be spelled out in advance, in order to motivate firms to catch up in terms of productivity and competitiveness. Second, if firms fail because they cannot compete when protection is relaxed, they should be allowed to go out of business. If limits to protection are not clearly specified, rent-seeking behavior will set in, with all the associated deadweight costs for the economy in terms of wasted resources, higher prices, lower quality, and reduced choice. It must be clear that, at a certain point, domestic producers are required to compete. SDT provisions could be designed in a calibrated manner to meet these conditions in a manner consistent with development needs.

The Article XVIII provisions on infant industry exceptions have rarely been invoked. One likely reason for this is that countries have preferred to apply import restrictions under the Article XVIII:B justification for balance of payments protection, as Article XVIII:B is easier to apply and does not call for compensation following the introduction of new trade restrictions. Article XVIII:B has been used in the past by more than 20 countries.

This perception that Article XVIII:B has served purposes other than those intended led to closer scrutiny of the provision. The Tokyo Round Declaration on Trade Measures Taken for Balance-of-Payment Purposes (GATT 1980, 205–9) requires members to give priority to price-based measures over quantitative restrictions and to announce schedules for removing the measures. In the Uruguay Round, more procedural requirements were introduced. Most notably, in all cases of balance of payments considerations, the International Monetary Fund (IMF) is consulted. The IMF is meant to act as a neutral guarantor that genuine balance of payments problems and not infant industry-type protection are the underlying motivation for seeking restrictions. Therefore, WTO members are required to accept all findings of statistical and other facts presented by the IMF relating to balances of payments, in particular the IMF’s determination as to “serious decline,” “very low level,” or “reasonable rate of increase” in monetary reserves. These modifications were at least partly informed by the insight that fiscal and monetary instruments have greater effectiveness in meeting balance of payments shocks than trade restrictions and distortions. This is in the interest of users—promoting domestic and foreign confidence in a country’s economic policies is the principal objective of reserve adequacy, which would likely be

undermined if trade restrictions were used to increase reserves in the absence of a real payments crisis.

Are there convincing industrial policy successes that can be emulated? Two of the most widely quoted cases of allegedly successful industrial policies are Mauritius and the Republic of Korea. Mauritius had a highly restrictive trade regime. In order to prevent protection from translating into an export tax, it effectively segmented its export sector from the rest of the economy by creating export processing zones (EPZs). While this did not completely offset the antiexport bias of import restrictions, the export sector thrived nevertheless on account of preferential market access in major industrial nations (Subramanian and Roy 2001). Other countries followed the same strategy as Mauritius without the same results. Part of the reason for this is almost certainly associated with the challenge of managing the rent seeking, corruption, and inefficiency that is embodied in all policies of selective intervention. Mauritius ranks well above many other developing countries with respect to most indexes of institutional quality and, therefore, did well where others failed. The absence of stable and competent institutions is a powerful argument against attempting to replicate the Mauritian experiment. Moreover, protectionism by major developed countries in the sugar, textiles, and clothing sectors in combination with preferential access enjoyed by Mauritius were key to its expansion of production. These preferential margins are bound to come down. As noted earlier, preferences lose their attractiveness the larger the number of eligible countries and the smaller the preferential margins become.

Some skepticism has been voiced as to whether industrial policies, rather than other factors and circumstances, were key to the Republic of Korea's success. The evidence does not support the notion that selective intervention had a decisive or even positive impact on the Korean economy. Empirical estimates suggest that resource misallocation reduced GDP by 1–3 percent (Noland and Pack 2003). Government competence was probably the main reason why the negative side effects of interventionist policies remained within certain boundaries. Yet much of the governmental effort resulted in numerous interventions that offset one another and created a cumbersome system whose net outcome might have been achieved by simpler means, including low uniform protection. Perhaps more important to Korea's success were heavy investments in generic infrastructure available to all sectors, such as education and roads. Initial conditions in Korea were also different from those in many contemporary developing countries. Korea pursued prudent macroeconomic policies (low inflation, stable real exchange rates, responsible fiscal policies) and enjoyed a high rate of domestic savings. It also had large endowments of human capital and a certain degree of preexisting industrial structure.

5.2.5 *Additional Freedom to Subsidize Exports*

A number of developing countries have advanced SDT proposals for full flexibility in applying subsidies and seem unconcerned about subsidy competition among themselves. Such proposals run counter to the general wisdom that subsidies can cause severe allocative distortions and hurt development. For certain types of export subsidization, fast-track extension procedures were agreed at Doha for a range of developing countries not included in Annex VII of the Agreement on Subsidies and Countervailing Measures (SCM). These procedures comprise a set of economic and policy criteria setting an eligibility limit, for instance, on size and per capita income. Other countries have the possibility to request extensions on a case-by-case basis, including by making reference to competitiveness concerns in regard to countries benefiting from the fast-track procedures. One SDT proposal suggests that these criteria, which explicitly include thresholds to limit the harm that may be inflicted on other developing countries, not be strictly respected for any developing country seeking an extension.

Can export subsidies be justified? One argument for export subsidies is that they help diversify economic activity. But after reviewing experiences in Asia and Latin America, Panagariya (1999) concludes that the results of decades of export subsidization did not seem to warrant the costs incurred. He finds that as soon as trade liberalization and sound macroeconomic policies were pursued, good progress on exports was made, despite a simultaneous and sharp reduction in export subsidies. He cites Nogués (1989), who reviews a large number of country experiences and concludes that the diversification of exports toward manufactures occurred when policies of more open import regimes and relative stability in real exchange rates were pursued. The provision of export subsidies was not a common element among successful countries. Nogués finds that subsidizing countries incurred large opportunity costs and an additional waste of resources through rent-seeking activities induced in the private sector.

Economic arguments for subsidization of specific industries relate either to market imperfections or externalities. In the first case, a firm that can expect learning-by-doing (dynamic) economies of scale may be profitable in the long run but faces higher costs at the beginning of its operations. Absent efficient capital markets and the possibility of obtaining sufficient funding to cover initial losses, potential investors may hold back on a genuinely worthwhile business venture. The provision of governmental subsidies would close this financing gap.

This represents only a second-best policy. The preferred solution would be to correct the capital market imperfection directly—through a better regulatory framework that facilitates the provision of financial services, including through liberalization, for instance. Second-best instruments inevitably trigger further

distortions, such as the threat of corruption and the danger of perpetuating support for one industry and the implicit resource transfers from other sectors. Moreover, suboptimal situations often result from primary policy distortions. For pragmatic reasons a government may prefer to mitigate resulting inefficiencies by introducing further distortions rather than by changing the original policy. Minimum wage laws are an example of a policy a government may hesitate to abolish. Production subsidies may be a less distorting way of remedying labor market rigidities, but revenue constraints and limited administrative capabilities to collect and redistribute financial means may militate against their use and leave a government with the sole possibility of providing fiscal benefits to its exporters.

External economies occur when a firm's private costs exceed the social benefits produced and those benefits cannot be fully internalized. Pioneer companies may incur costs for building an industry's reputation, generating publicly useful information, or training workers that are later bid away by competitors. The activity may not be undertaken unless subsidies pay for the positive externalities engendered. Externalities are a widespread phenomenon, and government interventions to remedy a situation of underinvestment can take a variety of forms. Yet given the rather sobering experience with import-substitution policies, doubts are in order as to the ability of governments to pick "winners," especially where administrative capacities are limited.¹⁹ A better strategy for governments may be to provide professional education programs and sustain functioning institutions and infrastructure—in relation to trademarks and intellectual property protection, for instance. Such economywide measures allow for a general sponsorship of socially beneficial activities and provide a means of internalizing positive externalities by individual firms.

It is even harder to make an economic case for specific subsidies to the export sector. Panagariya (1999) raises the possibility that a pioneer exporter builds the reputation of a country that followers will benefit from. First-best policies to improve a country's reputation directly may relate to issues such as governance and economic stability.

Other externalities may include learning spillovers specifically attached to exporting and not producing for the domestic market. Tybout (2000) finds no evidence for this. In addition, he establishes that most exporting firms are already more efficient before they start exporting, which allows them to take on international competition in the first place. However, many developing countries confer subsidies upon firms located in EPZs. It appears that access to the subsidies provided to companies in EPZs is by definition contingent on export performance. Hence they would seem to be subject to the prohibition in SCM Agreement Article 3, which seeks to forestall subsidy competition among governments. Hoekman, Michalopoulos, and Winters (2004) note that such competition would

not only lead to the transfer of rents to powerful companies that can play governments off against one another, they would almost certainly harm poorer countries, which cannot afford subsidies.

Can export-processing zones be consistent with WTO rules? Many developing countries believe EPZs have played an important role in their development.²⁰ Are they incompatible with WTO rules? EPZs have contributed significantly to job creation and income generation in developing countries (Madani 1999). For this reason alone, developing countries see merit in EPZs, even if net exports have often remained low (given that a large portion of inputs is imported), backward linkages limited, and investment concentrated in low-tech operations. In certain cases, EPZs did indeed entail positive spillovers, as a result of demonstration effects of entrepreneurial skills that were copied and transferred to other industries.

The concept of EPZs cannot easily be discarded; such arrangements merit a closer look. Many developing countries have had early success in putting in place an efficient administration and sound infrastructure in a confined space of their territory. In view of resource constraints, the capacity to do this on an economy-wide scale is limited in the early stages of industrial development. Such incentives may indeed be a prerequisite, even if not a sufficient condition, for attracting investment into nontraditional manufactures.

As discussed above, the case for subsidizing exports must be carefully qualified. But if EPZs are considered useful, perhaps elements of export subsidization could be transformed into WTO-compatible incentive schemes while continuing to fulfill the objectives of the zone.²¹ If existing incentive schemes are to be kept in place, the contingency on exports could nevertheless be lifted if firms were allowed to operate in EPZs without being required to export. This implies that EPZ firms could also supply the domestic market. Companies in the Manaus EPZ in Brazil, for instance, are permitted unlimited sales within the country (Madani 1999). Such an approach crucially enhances the potential for forward linkages in the economy. Even if a majority of the goods produced within a zone is exported, any subsidies to firms related to operation within the EPZ cease to be contingent on export performance.

Another solution that keeps incentives untouched would be to extend benefits enjoyed by exporters within the zone to firms outside. For instance, tariffs on capital goods and key raw material inputs could also be eliminated for domestic firms. Additionally, the implicit discrimination against domestic input production, which can act as an important obstacle to the creation of backward linkages, could be removed. Developing countries argue that they cannot afford to grant income tax exemptions to all domestic firms or forgo all tariff income on capital goods, two of the major benefits frequently provided to EPZ firms. While income

taxation is an important source of government revenue, it is debatable whether much would be lost if domestic industries were also to enjoy tariff-free importation of equipment, transport vehicles, and other capital goods and if parallel tax collection rates were improved.²²

Alternatively, EPZ incentives could be modified in a way that would maintain only those elements of export contingency that are WTO-consistent and abolish all export subsidy components of the incentive package. For instance, exemptions from direct taxes and from import duties on goods that are not consumed in the production process would need to be eliminated. WTO-compatible duty-drawback schemes could be installed for the importation of other inputs, which would remain de facto duty free. Other forms of export assistance could be offered, such as the provision of export credits at interest rates at or above those actually paid by the government. Even in developed countries export credit agencies raise funds in international markets and extend credit to exporters at interest rates in excess of what the agencies pay. These rates may still be better than individual firms could obtain.

In view of the risks of subsidy competition, it seems doubtful that SDT exemptions on export subsidization would be beneficial to developing countries overall. Rather, it appears important, especially for economically weaker and smaller developing countries, that common principles in the provision of incentives be respected. The multitude of tax breaks and holidays is easily matched and competed downward by other zones around the world. Even if an attractive incentive package is offered, success may remain elusive. Madani (1999) provides an overview of experiences in African countries that matched concessions provided by counterparts in Latin America and the Caribbean. In most cases the establishment of EPZs and generous provision of export incentives did not lead to significant investment in export manufacturing in view of other constraints, related, for instance, to education levels or inadequate private property and labor laws. It may therefore be reasonable to assume that other conditions relating to adequate infrastructure, reliable institutions, sound macroeconomic policies, and minimal red tape have a greater effect on the success of EPZs and a country's integration into the world economy.²³

Is there a systemic bias against developing countries' exporters? Other arguments in favor of export subsidization refer to a systemic bias in the capital markets against developing countries' exporters. First, asymmetric information is alleged to lead creditors to view exporters in developing countries, including creditworthy operators, as high risk. Second, developing countries demand more flexibility to finance their exporters in view of the fact that developed countries are allowed to provide concessional financing under paragraph (k) of Annex 1 of the SCM Agreement.

It is difficult to estimate the relevance of the first issue. In general, it would appear that creditors are more likely to curtail credit to other borrowers and favor exporters who demonstrate their ability to compete successfully in international markets. Exporters are also usually able to access international capital markets more easily than other domestic firms to secure credit on more favorable conditions. If a country feels compelled to pursue a high interest rate policy, there is still little reason to believe that this would adversely affect the export sector in particular. Quite to the contrary, exports by developing countries are typically based on their comparative advantage in labor-intensive and not capital-intensive industries, which are more interest rate sensitive. The IMF considers that the most appropriate policy response would be to eliminate the underlying distortion rather than to introduce new distortions in the form of subsidized export credits (Tokarick and Subramanian 2003).

On the second issue, it is true that the interest rate floor established in paragraph (k) of Annex 1 of the SCM Agreement includes an element of export subsidization. This floor applies equally to all members, but developing countries hold that they are unable to borrow funds at rates low enough to allow them to extend export credit at the authorized floor rate. This is why they see the need to use other forms of export subsidization, such as interest buy-downs or export credit guarantees. They complain that an explicit safe harbor is created for *de facto* exclusive use by developed countries, while other provisions they may be interested in do not provide the same level of comfort and clarity. These issues merit further thought. But rather than calling for a wide-ranging authorization of export subsidization, redress may be sought in the current negotiations on WTO rules or within the international undertakings on official export credits referred to in paragraph (k).

Should SDT be given to other forms of subsidies? Many other forms of subsidization are used everywhere in the world that are neither prohibited nor actionable (that is, impossible to countervail) under WTO rules. The provision of unemployment benefits or general subsidization of health and education programs are of particular importance to the less well-off in all societies. The rules and disciplines set out in the SCM Agreement apply to specific subsidies granted to a specific enterprise or group of enterprises or industry or region; subsidies granted within an economy are generally not covered.²⁴ Some developing countries wish to expand the range of specific subsidies considered nonactionable. In the SDT discussions, a proposal was made to continue for at least eight years the nonactionability of subsidies that may have served a genuine purpose in privatization programs in order to ensure “good adjustment of the economy.”

Rather than carving out broad exemptions for somewhat unspecified purposes under the heading of SDT, the reinstatement of the category of nonactionable

subsidies seems to be amenable to a wider coalition of developing and developed countries. This provision was allowed to expire in 2000, as it was considered not to reflect the specific interests and circumstances of all the members. It included subsidies for research activities, disadvantaged regions, and adaptation of firms to new environmental requirements, subject to precise sets of conditions. Proposals on how to make this category more relevant for developing countries have so far remained at a general level, referring to subsidies targeted at technology research, production diversification, and development. Only once the specifics of these ideas are known will it be clear whether the concept of “green” subsidies would be upheld to comprise only those that have little or no impact on trade.

An indication of the kind of developing country concerns that could be accommodated in a category of minimally trade-distorting support that is nevertheless available to all members is given in the area of agriculture. The so-called Green Box covers certain direct payments to producers and a wide range of government measures, such as marketing and promotion services, a variety of infrastructural services, food security programs, and domestic food aid, all subject to specific criteria. The chair’s draft modalities contain elements that could possibly be added, such as payments to small-scale producers and family farms for the purpose of maintaining rural viability and cultural heritage in developing countries. However, the Agreement on Agriculture also seems to recognize the need to support production in developing countries despite trade-distorting effects, in the case of investment subsidies and agricultural input subsidies generally available to low-income or resource-poor producers, for instance. The chair’s draft modalities contain additional elements for possible inclusion, such as subsidies for the establishment of regional and community credit cooperatives or transportation subsidies for agricultural products and farm inputs to remote areas.

Flexibility to subsidize must be carefully designed. It is difficult to make a case for subsidies that hurt the trade of other countries. There is no reason to believe that a downward spiral of subsidy competition would not set in among developing countries. Even under purely domestic considerations, subsidies may frequently not be the best instrument to achieve some of the objectives commonly advanced by developing countries. The case is not entirely clear-cut with respect to EPZs. In order to determine whether SDT may be warranted, it may be useful to consider whether EPZs are a step toward further economywide reforms or whether they reduce the need to liberalize the rest of the economy. The latter may be the case if the subsidized export sector earns foreign exchange and creates new employment opportunities to an extent the government considers sufficient. This may lead to a protraction of policies of high protection for import-competing industries that many countries pursue in parallel to export promotion. Even if this is the case,

export policies that merely offset the effects of import protection, such as duty-drawback schemes, are preferable to policies with an export subsidy component.

Subsidies cannot be condemned across the board, for several reasons. First, in some cases developing countries could usefully provide production subsidies that are limited to at most minimally trade-distorting measures—in supporting subsistence farmers, for instance. Second, a practice that contains an export subsidy element, such as average compensation for duties paid, may be tolerated for a given period of time because of its administrative simplicity. In such a case, a pre-determined plan for the phase-out or conversion into a WTO-compatible scheme is crucial. Despite being of development value, such time-limited exceptions may have to be limited to the poorest and smallest countries, in order to reduce the adverse effects on others.

5.2.6. Postponing the Application of Certain Rules

The implementation of certain multilateral commitments and concomitant domestic reforms may involve considerable adjustment costs. With the acceptance of the Uruguay Round Agreements as a Single Undertaking, most developing countries saw a sharp rise in their obligations. While a number of developing countries were in the process of liberalizing unilaterally (that is, reducing trade protection at the border), many had yet to address behind-the-border measures in a systematic fashion on the scale implied by the agreements.

There may be a need for more time to adjust to new rules. Some of the WTO agreements require investments in capacity to support their implementation and ensure that countries derive benefits from them. Examples are training and infrastructure to implement commitments under the Agreement on Implementation of Article VII of GATT 1994 (customs valuation agreement) or the Agreement on Technical Barriers to Trade. A distinction needs to be made between adjustment related to a lack of implementation capacity and adjustment related to political difficulties in reaching compliance, which often refers to the political economy costs stemming from changes in sectoral employment and output patterns associated with the phasing out of trade-distorting measures. Ultimately, the removal of distortions must be considered beneficial (an example would be the elimination of a protectionist bias in favor of industrial lobbies that removes the implicit taxation of the rural agricultural sector, in which the majority of the poor may be engaged). Hoekman, Michalopoulos, and Winters (2004) therefore argue against exceptions on core disciplines, such as tariffs and other policy-induced distortions (notably subsidies and TRIMs).

In the short term the existence of adjustment-related costs requires governments to devise flanking policies, develop alternative measures to pursue certain

nontrade policy objectives, and address structural obstacles (such as insufficient intersectoral factor mobility) that may otherwise amplify costs or cause them to persist. Other costs may relate to the establishment of social safety nets to cushion the overall liberalization process. Despite the gains from an improved allocation of resources in the long run, liberalization may imply transitory hardships stemming from changes in production patterns (WTO 2003b). This is why temporary exceptions may be necessary even in areas in which the economic case for trade policy measures is weak. But in order to ensure predictability and provide the incentive to undertake reform, not merely postpone the day of reckoning in the hope of further extensions, a clear deadline for temporarily authorized trade-distorting measures must be set.

While difficult to bear in the short run, costs associated with the capacity to implement WTO agreements are not deadweight losses. Ultimately, investment in the establishment of an efficient customs or standards authority is beneficial. Implementation costs in such cases are not in themselves an argument against policy reform. However, an assessment within a wider policy framework is required as to when such costs should be incurred. In the case of customs valuation, for instance, time-limited extensions have been authorized by the WTO membership on a country-by-country basis. In each case an attempt was made to assemble a technical assistance and capacity-building plan that was supposed to address the specific constraints impeding progress in customs reform. This model provides some useful elements for consideration in the context of multidonor technical assistance programs. But the WTO is not in a position to deliver most of the required assistance itself, and donors are not able to guarantee successful outcomes. While being an indispensable complement, technical assistance cannot substitute for legally enforceable SDT obligations. Making the provision of trade-related technical assistance mandatory is not helpful, as the donor community may simply shift resources away from other development priorities. In addition, the incentives for genuine restructuring and reform at the receiving end may be hampered if insufficient assistance could serve as a scapegoat in the face of a lack of political will.

Just how much time is enough? In light of the above, many SDT proposals that have sought exemptions from implementation obligations for an unspecified time have not been well received. In the post-Doha discussions, some developing countries proposed, for example, that extensions of the transition period for implementation of the Customs Valuation Agreement, including the right to use minimum values, be renewed automatically upon request by a developing country member. A number of other proposals of a similar nature have been put forward. Under such arrangements, beneficiaries of SDT would be self-selecting and would

determine for themselves when they were ready to assume a higher level of obligation. Many WTO members have reservations about such arrangements, because they would be devoid of any contractual character and would not guarantee any significant reform effort in the foreseeable future. But if autonomous decision making is unacceptable in this field, what arrangements could be made to ensure that SDT provisions are responsive to development needs?

Three issues arise. First, in many cases transition times for implementing various agreements are set at a standard length for a range of countries with markedly different levels of resources and at different stages of development. Examples of such provisions include an extended time period for implementing reduction commitments under the Agreement on Agriculture (Article 15.2), a longer elimination period under the Agreement on Trade-Related Investment Measures (Article 5.2), extended implementation periods for applying certain provisions of the Agreement on Implementation of Article VII of GATT 1994 (Customs Valuation, Article 20.2), delay in the implementation of certain provisions of the Agreement on Import Licensing (Article 2.2, footnote 5), and transitional periods for the implementation of the Agreement on Trade-Related Aspects of Intellectual Property Rights (Article 65).

A second feature of a number of SDT provisions not to the liking of many developing countries is that access to SDT will be decided by the membership upon the request of a developing country member. In a consensus-based institution like the WTO, the concern is that the discretionary character of decisions relating to SDT may lead to undesirable forms of conditionality and arbitrariness. Examples of such discretionary provisions include compliance delays under the Agreement on the Application of Sanitary and Phytosanitary Measures (Articles 10.2 and 10.3), time-limited exceptions to certain provisions of the Agreement on Technical Barriers to Trade (Article 12.8), and extensions to the standard SDT provisions under the Agreement on Implementation of Article VII of GATT 1994 (Customs Valuation, Annex III.1 and III.2). Governments want more policy certainty.

Third, all the SDT provisions cited above, and many more, refer to developing countries as the beneficiary group. But developing country status has never been formally defined in the GATT/WTO. Members have decided for themselves whether they are developing countries and by extension whether they wish to take advantage of SDT provisions. Developed countries have tried a different approach to defining developing country status by reference to graduation, but this has proved no more successful as a means of defining an explicit category.

In sum, the vast majority of SDT provisions are blunt policy instruments. They do not distinguish among developing country members in terms of their differing development needs,²⁵ access to some SDT provisions is left to the discretion of the

WTO membership as a whole, and most provisions define beneficiaries in terms of an ill-specified group called developing countries.

As discussed below, a possible approach to all three of these problems would be to define access to SDT as an integral part of the provisions themselves. This could be done through a more differentiated approach to setting time frames for implementation on the basis of certain development-related criteria or preferably in a more direct manner through explicit thresholds based on economic criteria. Mention has already been made of the GDP per capita criterion for access to export subsidies on manufactures. Other examples of this approach can be found in the Agreement on Subsidies and Countervailing Measures and the Agreement on Safeguards, where certain thresholds exempt developing countries from investigations or actions. These provisions are still couched in terms of developing countries as beneficiaries, but they rely on the notion of a threshold and could perhaps be designed in a manner that obviates the need for reference to developing countries as beneficiaries.

5.3 A New Approach to Special and Differential Treatment

In recognition of the fact that meaningful SDT can be achieved only if it responds more effectively to differing needs among developing countries, all new approaches to SDT that have been advanced by academics and other researchers in recent years recommend differentiating among developing countries. Three principal strategies have been advocated. First, total flexibility could be given to all countries whose noncompliance does not cause harm to other countries (Stevens 2002). In the area of customs valuation, this idea may be inspired by the observation that a range of developing countries and LDCs have not asked for SDT and hence are supposed to have implemented the agreement. In all likelihood, they disregard their obligations while remaining unscathed, due to their minor importance to trading partners. It is very doubtful that this practice—essentially an expression of lack of interest in smaller and poorer countries, which most need integration into the multilateral trading system—should be formalized under the heading of SDT. It would defy the fundamental insight that WTO disciplines can help in many ways to strengthen the ability of developing countries to design trade policies that are oriented toward integration into the world economy and supportive of economic development and growth.

Second, it has been argued that current country groupings need to be renegotiated. This would mean that WTO members cease to be able to self-select their developing country status and be categorized into a larger number of subgroups than is presently the case. Hoekman, Michalopoulos, and Winters (2004) contend that an “LDC+” group of small and poor developing countries determined by size

and per capita criteria would by and large capture those countries in real need of SDT across all WTO agreements. In order to deal with individual countries that claim inclusion in this group on a case-by-case basis, a demanding appeals procedure is proposed. The major disadvantage with this approach is that it continues to feature two of the main elements that render current SDT less than fully functional, namely, making the same group of countries eligible for SDT across all agreements and making eligibility for any other deserving developing country subject to discretionary decision making by all members.

Finally, in an attempt to adopt an agreement-specific focus and tailor the provision of SDT more to the needs of individual countries, Wang and Winters (2000) and Prowse (2002) espouse similar concepts involving an assessment of the costs and the capacity of countries to implement WTO agreements. As a result of these "audits," a time interval would be determined during which the country is exempted from the rules and a tailor-made program of technical assistance and capacity building is provided by a broad range of relevant donors. It is doubtful that the necessary coherence in national policy making or between international and bilateral donors currently exists to realize such an ambitious and resource-intensive approach to SDT. Moreover, these types of assessments leading to sophisticated technical assistance plans for individual countries are already undertaken within the integrated framework for LDCs. Making assistance on the basis of needs assessments available to a broader range of developing countries should complement SDT, but this cannot substitute for a set of legally enforceable provisions.

A common critique of all of the above approaches is their strong emphasis on creating new country groupings. This criticism is unrealistic. Among the reasons why WTO members resist such an exercise, even if assured that it would be limited to SDT matters, is their fear of spillover effects to the negotiations, where the impression of belonging to a sufficiently advanced subgroup receiving less SDT than another is likely to lead to more extensive demands by negotiating partners. A calibration exercise undertaken by the OECD was put on the back burner by OECD members, supposedly because whatever statistical approach was chosen, some developing countries were always grouped together with developed countries and others with LDCs. Despite the understandable uneasiness about such stark differentiations, the analysis by the OECD provides a good basis for further research into economic and social indicators that could be used to define implicit thresholds defining access to individual SDT provisions.

The heterogeneity of developing countries may be more appropriately reflected in a sectoral approach. The issue-specific analysis by Stevens (2002) in the field of agriculture is an illustration of an implicit threshold approach to SDT. The key element of an implicit threshold approach to SDT would consist of identifying

measurable criteria that define access to SDT on a provision-specific basis. For some issues, access may be open-ended and directly linked to the fulfillment of the criteria, for others access may be time bound. An important feature of provision-specific access thresholds would be that the group of eligible countries is initially open and may differ from the set of countries that fulfill the criteria devised for other provisions and agreements. An example of this approach is the fast-track procedures for extending transition periods under Article 27.4 of the SCM Agreement. Members fulfilling specific economic criteria and adopting defined programs may continue to use certain kinds of export subsidies for a limited period of time. The choice of criteria limiting eligibility to relatively poor and small countries—share of world merchandise export trade not greater than 0.10 percent and total gross national income (GNI) for 2000, as published by the World Bank at or below \$20 billion—effectively allows export subsidies to be used only by countries without the ability to influence world market prices and trigger subsidy competition.

The merit of provision-specific SDT access criteria has been illustrated by Stevens (2002), in what so far has been the only scholarly exercise along these lines. His attempt to develop a pragmatic case for SDT is based on the premise that eligible countries must share a set of characteristics that are directly related to the rules for which SDT is proposed. He undertakes an illustrative analysis of criteria that are relevant to a specific SDT concern in the agricultural area and determines the range of countries captured by various thresholds. Under the assumption that some form of SDT relating to the subsidization of domestic production is provided for food-insecure countries at the end of the current negotiations on agriculture, Stevens (2002) asks which country characteristics could usefully be combined to determine access to such a hypothetical provision. He observes that low GDP and reliance on imported food—seemingly obvious and necessary indicators of growth prospects and food-trading possibilities—are not sufficient to capture the phenomenon of national food insecurity. Instead, he proposes per capita calorie supply as a basic indicator of countries in which significant parts of the population are vulnerable to food insecurity. In addition, the share of agricultural value-added in GDP is used as a measure of the degree to which food insecurity may be related to agricultural income and/or may be potentially alleviated by improved domestic production. Combining a minimum per capita calorie intake of 2,500 a day (which is endorsed by the United Nations Food and Agriculture Organization) and a 20 percent share of agriculture in GDP, Stevens comes up with a set of 43 countries sharing both criteria and a set of 76 fulfilling at least one. Interestingly, more than a quarter of the first set and almost 40 percent of the second one are neither net food-importing developing countries nor LDCs, suggesting that these two commonly used country categories in the WTO may not suffice to characterize countries to be targeted by SDT.

In view of the negative effects that subsidization may have on other countries, Stevens suggests a third qualifier of a maximum 0.25 percent share in world agricultural exports. This is similar in principle to the 0.10 percent merchandise export share used in the SCM Agreement fast-track procedure aimed at limiting possible negative impacts on third countries. The precise threshold figures may obviously take different values, as a function of an agreed maximum cumulative effect, for instance.

The upshot of this analysis is that whereas LDCs may form the core of any group of countries eligible for SDT, a provision-specific approach allows for the additional, automatic (that is, not depending on the discretion of other members) integration of countries with specific SDT needs. The advantages of provision-specific thresholds in terms of reflecting more closely the concrete needs of eligible countries are particularly evident when Stevens' results are compared with, for example, the set of countries covered by the SCM Agreement fast-track approach.

This comparison appears in the annex to this chapter for the two core criteria of each provision-specific approach.²⁶ It reveals significant differences between the two sets of eligible countries and demonstrates that the application of either set of criteria to both provisions would not properly reflect the array of countries that should arguably benefit from a given SDT provision. Applying Stevens's (2002) criteria to the SCM Agreement fast-track issue would have resulted in the exclusion from eligibility of several countries that have been granted a time-limited exemption with respect to specific export subsidy programs (Bahrain, Barbados, Belize, Costa Rica, El Salvador, Fiji, Grenada, Jamaica, Jordan, Mauritius, St. Kitts and Nevis, and St. Lucia). Conversely, several food-insecure countries, as measured by the standards laid down by Stevens, would not be eligible for SDT if the SCM Agreement fast-track criteria were to be applied (Armenia, Croatia, India, Nigeria, Pakistan, Peru, Philippines, Thailand, and Venezuela). Most of these countries would presumably also have been barred from SDT if the approach adopted by Hoekman, Michalopoulos, and Winters (2004) had been pursued to define a new "low-income and disadvantaged country group," consisting of very small economies as well as low-income countries, horizontally across all agreements considered to be particularly resource-intensive in their implementation.

At least two important qualifications are in order. First, the nutrition indicator used to identify food-insecure countries bears almost no relevance to the question of a more general extension of export subsidization. While the comparison may seem absurd, it allows us to shore up an obvious yet important insight. The intention here is simply to illustrate that the more need specific an SDT provision is—and hence the more diligent an effort is made to avoid leaving out countries that deserve inclusion and vice versa—the less easily its threshold criteria may be transferred to other SDT contexts. Conversely, the blunter the criteria, the more

similar the two sets of countries are likely to be but the higher the probability that deserving countries are omitted in any individual context. For instance, if Stevens's third criterion (a maximum 0.25 percent share in world agricultural exports) were added as an overarching threshold confining eligibility to small economies, Thailand would be eliminated from eligibility and the set of countries would become more akin to the one qualifying for SCM Agreement fast-track treatment.

Second, the SCM Agreement approach reflects more of a political compromise. Unlike Stevens's selection of criteria, it was not explicitly premised on development relevance as a guiding principle. Hoekman, Michalopoulos, and Winters (2004) argue that certain "developmental" preconditions that need to be fulfilled before implementation becomes beneficial can be proxied by indicators defining LDCs plus a minimum level of per capita income and size. Yet for specific SDT needs—such as food security—current constraints and options are as much, if not more, a function of past policy choices, events, and wider circumstances than they are, for instance, a function of levels of income or country size. This calls for a more fine-tuned approach that allows individual countries to qualify for a specific SDT provision even if excluded from many others.

The single greatest challenge for a new individual threshold approach to SDT consists of defining analytical criteria that are relevant to specific SDT concerns and measurable with existing data. This process should ideally be as depoliticized as possible and build on the insight that relatively more advanced developing country members still gain in resigning themselves to access to fewer but enforceable and relevant SDT provisions. It should also be acknowledged that while development relevance is the key determinant in selecting appropriate threshold criteria, the effect of access to SDT on other countries or on the functioning of the multilateral trading system will figure as second-order considerations. This problem is likely to be relevant only in a few areas, such as subsidization and certain forms of import protection, for which the economic case may be contentious and the negative impact on others strong but for which pragmatic arguments can be adduced to justify temporary exceptions. Provision-specific SDT may, in such cases, afford only a "once-off" time interval to countries qualifying under the threshold criteria at a certain point in time. Time intervals may also vary on the basis of a set of staggered criteria that provide longer time frames to weaker members. Such an approach would allow for the sequencing of trade reforms with respect to other trade and broader economic reforms.

For the other type of adjustment costs—stemming from human and institutional capacity requirements—Hoekman, Michalopoulos, and Winters (2004) propose SDT for an "LDC+ group" in the form of exemptions from agreements that have been identified as "resource intensive." The underlying logic behind this argument appears to be that as countries progress to higher levels of development,

they will be in a better position to undertake the various investments needed to support reform. The counterargument is that development prospects are likely to be enhanced if reforms are undertaken in the first place, rather than delayed, as even agreements such as customs valuation contain elements that are less resource-intensive but effective in tackling entrenched policies that hinder rather than promote development.²⁷ Provision-specific thresholds could prove to be a pragmatic solution to this dilemma. Qualifying countries would be exempt from a specific provision (for example, the prohibition to use minimum values in customs valuation) as long as the objective criteria are fulfilled. In certain cases it may be that countries lose eligibility and can subsequently fall back under the threshold, even repeatedly. Conversely, key provisions of the agreement—such as Articles 9 and 10 of the Customs Valuation Agreement, relating to currency conversion and confidentiality requirements—would continue to be applicable.

This discussion has focused on SDT within existing agreements, bearing in mind the experience of debates in the Special Session of the Committee on Trade and Development. However, the proposed approach would be as applicable where additional elements of SDT are being designed under new agreements or differentiated approaches to trade liberalization commitments are being negotiated.

5.4 Concluding Remarks

For many developing countries, a satisfactory outcome on SDT issues will be at the core of their judgment on the results of the Doha negotiations and the utility of the WTO as an institution supportive of development. The focus here has been largely on SDT in terms of the debate as it has unfolded in the WTO. The discussion is not about whether SDT provisions are legitimate but about how they should be designed to respond to the needs of developing countries as they undergo economic transformation through a process of development. Little mention has been made of other aspects of the multilateral trading system that also influence development. The question of better market access for products of export interest to developing countries has not been addressed nor has much attention been paid to the ways in which obligations under the WTO can help strengthen the ability of developing countries to pursue effective development policies.

The current SDT debate in the WTO has old and new elements. The old element springs largely from the post–Uruguay Round situation, where developing countries assumed a wide array of additional policy obligations under the WTO as result of the Single Undertaking. The quest for changes to these provisions through the implementation debate and the post-Doha SDT exercise has so far yielded few results. There are a number of reasons for this, relating both to the

manner in which the issues have been approached and the degree of willingness of members to make legal changes to provisions outside a negotiating framework. A more analytical approach to a subset of proposals on the table that carries real implications for the development prospects of developing countries might yield a more fruitful outcome. This “backlog” of SDT issues cannot be ignored where existing provisions can be shown to hamper development.

The new element in the SDT debate relates to negotiations under the Doha mandate. Here there is an easier opportunity to be innovative in designing SDT provisions to ensure that they are adequately tailored and respond to a clear and systematic formulation of the national economic interest. It would be regrettable if dissension around the old SDT agenda were allowed to obscure the search for constructive approaches in the current negotiations.

This chapter has attempted to disentangle the SDT debate and to point to directions in which discussions might go in searching out more promising prospects for agreement on the fundamental question of how to define and manage access to SDT provisions under the WTO.

The main conclusions of the chapter are summarized below:

- SDT proper is about legal rights and obligations, not legally unenforceable statements of intent or “best-endeavor” undertakings. For practical reasons, best-endeavor undertakings may or may not lend themselves to transformation into mandatory instruments. Where this is clearly not the case, or where to do so would offer little in the way of support to development, progress in SDT would be promoted if such provisions were taken off the table. Where analysis shows that making a nonmandatory provision mandatory indeed contributes to development, developing countries would gain from pursuing the relevant proposals.
- SDT provisions are not a safe haven from poorly framed rules that compromise development objectives. Where new policy areas or new rules are under negotiation or being considered for negotiation, the best interests of developing countries would be served through engagement with respect to the substance of core proposals. Seeking exemptions through SDT merely postpones any difficulties that might arise from inherently flawed rules. This does not mean that SDT provisions would be absent from a well-constructed set of rules.
- Treating SDT primarily as a political right, rather than as a rule-specific instrument to support development in particular policy areas, is a recipe for inconclusive discussion and mutual frustration. Reliance on generalized precepts about entitlements, or the lack of them, tends to lead to extreme positions. One such example is the often unspoken assumption behind SDT debates that since SDT is a right, the fewer the obligations developing countries assume the

greater is the contribution of the WTO to development. A similarly unhelpful politicization of SDT discussions arises from the tension between nonreciprocity and graduation. Graduation, in particular, cannot be usefully discussed in a binary, aggregated fashion whereby countries calling themselves developing are deemed at one stroke to have graduated to developed country status. The process should be gradual, provision specific, and driven by detailed analysis of development needs.

- Preferences have proved helpful to some countries for certain periods of time when certain other conditions have been present. Exports from such countries have gained footholds in industrial country markets in the presence of preferences.²⁸ But the utility of preferences can be overstated. In many cases countries lack the supply capacity to benefit from such arrangements, yet they may pay a price for them in terms of being unable to negotiate for better benefits elsewhere. Transaction costs often reduce the value of the preference margins or, if the margins are small, nullify the benefits altogether. Moreover, preferences for some mean discriminatory exclusion and potential losses for others. The larger the number of countries seeking preferential treatment and the more similar their export structures, the smaller will be the competitive benefit each country enjoys. When beneficiary countries are “too successful,” they may be dropped from schemes and left with overcapacity or a production structure that is not based on comparative advantage. Preferential arrangements create vested interests that oppose multilateral trade liberalization. Bearing in mind the inevitably temporary nature of preferences, inherent limitations in the benefits they offer, and the potential distortions they imply, a calculation is required of their value in terms of negotiating currency.
- Local content requirements and the protection of domestic industries against foreign competition may have done more harm than good to the growth prospects of some developing countries. Were countries to have total discretion through SDT to apply such measures, protection would likely persist and lead to permanent, development-inhibiting distortions in resource allocation within and among developing countries. A good case can, however, be made for a paced phasing out of trade-distorting measures and the provision of time to adjust. Predictability must be ensured by specifying clear time frames. Proposals for SDT should take account of the underlying welfare analysis rather than be based on the desire to maximize legal flexibility. The latitude to constrain imports should also be inversely related to the trade-restricting and market-distorting effects of the authorized measure (that is, giving preference to tariffs as opposed to quantitative restrictions) and to the potential negative impact on other countries and any adverse systemic implications for the functioning of the multilateral trading system.

- Flexibility to subsidize must be carefully designed to avoid wasteful subsidy competition. Some accommodation within general rules or as a matter of SDT can be provided for clearly defined purposes that, more often than not, have only minimally trade-distorting effects. Export subsidization cannot be generally justified in economic terms. Yet given revenue constraints militating against the use of production subsidies and limited administrative capacities in certain countries, there may be a case for extended phaseouts of export subsidy elements. To the extent that export subsidies are provided, these will typically be less distorting the more generally available they are (e.g., directed to infrastructure).
- Flexibility as to when developing countries should assume WTO obligations reflects an appreciation of the adjustment costs of change as well as administrative and infrastructural capacity needs that may be associated with implementation. But such flexibility should not be a blank check, as implied by some proposals in the post-Doha SDT exercise, and SDT should not be a blunt or mechanical instrument made available on uniform terms to all developing countries. Reliance on discretionary decision making by WTO members as to the terms and conditions of access to SDT on the part of individual members should also be avoided. Instead, to the maximum extent possible, SDT provisions should be defined in terms of economic needs that automatically identify beneficiary members. As these measurable needs diminish and disappear, so too would the right of a member to the provision in question. Thus eligibility thresholds should be development related. In some cases only once-off time periods may be obtained, with the possibility of affording longer time periods to weaker members. In other cases exemption time may be directly linked to the fulfillment of the threshold criteria. It was not the intention of the authors to provide any definitive answer as to how such criteria could be framed for individual provisions. This is a delicate and potentially time-consuming exercise that would need to be started at the earliest opportunity if such an approach were acceptable to governments.

Notes

1. For discussions of SDT, see Fukasaku (2000); Hoekman, Michalopoulos, and Winters (2004); Hudec (1987); Kessie (2000); Michalopoulos (2000); Pangestu (2000); Prowse (2002); Stevens (2002); Whalley (1999); and WTO (1999).

2. Parts of this section were used in WTO (2003a).

3. It was curious that developing countries were pushing hard in the GATT for improved market access for their primary exports at the same time that "export pessimism" and fear of deteriorating terms of trade in developing countries as result of their reliance on exports of primary products dominated the development debate. This reasoning provided part of the justification behind the argument that developing countries should diversify into manufacturing through import substitution policies.

4. The numerical preponderance of developing countries was beginning to assert itself at this time. In 1960, 21 members of the GATT were developed countries and 16 developing countries. By 1970 it included 25 developed countries and 52 developing countries.

5. Article XXXVI, Principles and Objectives; Article XXXVII, Commitments; and Article XXXVIII, Joint Action.

6. The only exceptions were the plurilateral agreements on government procurement, trade in civil aircraft, and dairy and meat products.

7. The reference to “other measures” is intended to cover such actions as promoting domestic structural changes, encouraging consumption of particular products, and introducing measures of trade promotion.

8. This may not be strictly true in at least one instance. If the provision of technical assistance were to become a legally binding obligation, it is unclear where this would fit in the taxonomy. But this is an unlikely outcome.

9. The fact that this chapter fails to address this matter has nothing to do with its degree of importance. The question of whether or how new subjects should be included in the WTO may have far-reaching implications for developing countries. But this is not an SDT issue in the sense that SDT provisions are no substitute for the avoidance of rules that do not support development. SDT should not be seen as a balm for bad rules. The rules themselves must reflect national economic interests, not exemptions from the rules. Good rules can and probably must contain elements of SDT, but that is a different matter.

10. The “opt-in, opt-out” approach to rule making was mooted in the run-up to Doha but met resistance from a number of developing countries.

11. Among WTO provisions that might be characterized as unfair in this sense are the differentiated rules on export subsidies in the agriculture and manufacturing sectors, the rules on the right to apply export subsidies in agriculture, and the different treatment of fiscal and financial export subsidies.

12. Decision of 28 November 1979 on Differential and More Favourable Treatment, Reciprocity and Fuller Participation of Developing Countries.

13. Preferences under GSP schemes developed in the 1960s and most of the 1970s were covered by a waiver before the Enabling Clause came into force. WTO members that grant GSP preferences under the Enabling Clause include Australia, Belarus, Bulgaria, Canada, the Czech Republic, the European Communities, Hungary, Japan, New Zealand, Norway, Poland, the Russian Federation, the Slovak Republic, Switzerland, and the United States (WTO 2001).

14. UNCTAD (1999) provides one of the most comprehensive overviews.

15. Keck and Low (2004) contains a longer discussion of trade preferences.

16. Hudec (1987) observes that preferences “tend to operate in a similar way to the sorcerer’s apprentice—generating more and more discrimination until the system finally breaks down under its own weight” (209–10). He refers to preferences as systems of “refined complexity,” built on an “orgy of fine-tuning” (211) and argues that the legal costs of such systems may well outweigh their economic benefits.

17. In services it has been proposed that developing countries be given priority in sectors of export interest to them, through the allocation of sectoral quotas, for example.

18. Tariffs continue to be a major source of tax revenue for several developing countries, including some of the poorest (Baungsgaard and others 2003). In such cases, liberalization needs to be stretched over longer time periods until compensatory measures, in particular the strengthening of the domestic tax system, can be effected. By the same token, lower tariffs may lead to an expansion of imports and rising tariff revenues. Tariff revenue collections could also be improved in some countries through customs reform.

19. Hausmann and Rodrik’s (2003) argument that government has a role to play in learning what a country is good at producing does not contradict the views presented here. They readily admit that governments have proven inadequate in “pruning investments that turn out to be high cost *ex post*” (35), which would be a necessary precondition to undertake investment promotion in the first place.

In their model the role that FDI could play in pioneering new activities under a laissez-faire scenario is put in question, due to alleged difficulties in adapting imported "off-the-shelf" technology to local conditions. Yet, interestingly, some of the anecdotes the authors refer to describe just that: the growth of a competitive industry, ultimately fully owned by locals, but launched through FDI.

20. Radelet (1999) includes references to country case studies in Africa, Asia, and Latin America.

21. Depending on specificity, WTO-consistent subsidies may still remain actionable and in certain cases be countervailed.

22. It should be borne in mind, however, that the factor intensity of production might be adversely affected by such policies, given relative factor endowments and related efficiency considerations.

23. For a country by country analysis of export promotion activities in Latin America, see Macario, Bonelli, Ten, and Niels (2000), who recommend a redesign of these policies for a variety of reasons and propose numerous ideas for change. The need for WTO compatibility is acknowledged but not examined for any of the proposed measures.

24. Under Article 2.3 prohibited subsidies, such as export subsidies, are by definition specific and therefore covered by the agreement.

25. An exception to this is the LDC category, although no distinctions are made among LDCs.

26. As stated above, LDCs are assumed to qualify for access to SDT under both sets of criteria or be automatically covered as the default group.

27. It is not intended here to repeat the discussion of whether the implementation of WTO rules is more burdensome or more necessary for poorer countries. Suffice it to recall that WTO rules are in many instances an important tool for governments to forge ahead with necessary reforms that are in the national interest but resisted by powerful lobby groups.

28. Successful exporters will have assembled a range of necessary conditions for exports to take off, so it is difficult to gauge how much export success to attribute directly to the existence of preferences.

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ANNEX TABLE 5A.1 A Comparison of Two Approaches

WTO Members Meeting Proposed Trade Share ^a and Total GNI ^b under the Subsidies and Countervailing Measures Fast-Track Approach ^c	WTO Members Meeting Proposed per Capita Calorie Supply ^d and/or Agricultural Value-Added Share of GDP ^e
Albania	<i>Albania</i>
<i>Antigua and Barbuda</i>	Antigua and Barbuda
	Armenia
<i>Bahrain</i>	
<i>Barbados</i>	
<i>Belize</i>	
Bolivia	Bolivia
Botswana	Botswana
Brunei Darussalam	
Bulgaria	
Cameroon	Cameroon
Congo, Dem. Rep. of	Congo, Dem. Rep. of
<i>Costa Rica</i>	
Côte d'Ivoire	<i>Côte d'Ivoire</i>
	Croatia
Cyprus	
<i>Dominica</i>	<i>Dominica</i>
<i>Dominican Republic</i>	Dominican Republic
Ecuador	
<i>El Salvador</i>	
Estonia	
<i>Fiji</i>	
Gabon	
Georgia	<i>Georgia</i>
Ghana	
<i>Grenada</i>	
<i>Guatemala</i>	Guatemala
Guyana	<i>Guyana</i>
Honduras	Honduras

ANNEX TABLE 5A.1 (Continued)

WTO Members Meeting Proposed Trade Share ^a and Total GNI ^b under the Subsidies and Countervailing Measures Fast-Track Approach ^c	WTO Members Meeting Proposed per Capita Calorie Supply ^d and/or Agricultural Value-Added Share of GDP ^e
Iceland	
<i>Jamaica</i>	India
<i>Jordan</i>	
Kenya	Kenya
Kyrgyz Rep.	Kyrgyz Rep.
Latvia	
Lithuania	
Macao SAR (China)	
Malta	
<i>Mauritius</i>	
Moldova	<i>Moldova</i>
Mongolia	Mongolia
Namibia	Namibia
Nicaragua	Nicaragua
	<i>Nigeria</i>
	Pakistan
<i>Panama</i>	Panama
<i>Papua New Guinea</i>	Papua New Guinea
Paraguay	<i>Paraguay</i>
	Peru
	Philippines
Solomon Islands	
Sri Lanka	Sri Lanka
<i>St. Kitts and Nevis</i>	
<i>St. Lucia</i>	
<i>St. Vincent and the Grenadines</i>	St. Vincent and the Grenadines
Suriname	
Swaziland	Swaziland
	Thailand

(continues on the next page)

ANNEX TABLE 5A.1 (Continued)

WTO Members Meeting Proposed Trade Share ^a and Total GNI ^b under the Subsidies and Countervailing Measures Fast-Track Approach ^c	WTO Members Meeting Proposed per Capita Calorie Supply ^d and/or Agricultural Value-Added Share of GDP ^e
Trinidad and Tobago	Venezuela, R. B. de
Zimbabwe	Zimbabwe

Note: In the left-hand column, economies identified in boldface are members listed in Annex VII(b) whose annual per capita (GNI) was less than \$1,000 on the basis of the most recently available data published by the World Bank. Members identified in italics are countries that have been granted an extension (all requests have been granted). In the right-hand column, countries identified in boldface meet only the per capita calorie supply criterion. Members identified in italics meet only the agricultural value-added share in GDP criterion. Countries identified in neither boldface nor italics meet both criteria. Neither column includes LDCs, as they are presumed to qualify for SDT in both cases.

a. Data are from the WTO. The threshold used is a share of world merchandise export trade not greater than 0.10 percent. The calculation of export shares was performed by the WTO Secretariat as reflected in Appendix 3 to the Report of the Chairman contained in WTO document G/SCM/38. The calculation was based on the methodology used in WTO (2000), table I.5. The world trade total used in the calculations includes trade within the European Union and EU reexports. To reduce the effect of volatility on export values, average 1998–2000 shares were used. Figures for a number of countries and territories were estimated.

b. Data are from the *World Bank Development Indicators* (2003). The threshold used is a total GNI for 2000, as published by the World Bank, at or below US\$20 billion.

c. No attempt has been made to remove from this list non-developing country members or any developing country members not otherwise eligible to request an extension pursuant to Article 27.4.

d. Data are from the United Nations Development Programme's *Human Development Report 2000*, table 23, as quoted in Stevens (2002). The per capita threshold used is 2,500 calorie a day.

e. Data are from the *World Bank Development Indicators* database Web site, as quoted in Stevens (2002). The threshold used is agricultural value-added as a share in GDP of more than 20 percent.

UNILATERAL PREFERENCE PROGRAMS: THE EVIDENCE

Çaglar Özden and Eric Reinhardt

Integration of developing countries into the global economy through increased trade is a long-standing and shared goal of all World Trade Organization (WTO) members. There are numerous benefits of lower trade barriers. Firms and consumers, especially in developing countries, gain access to a larger variety of goods at lower prices and of higher quality. Countries can specialize in activities in which they have a comparative advantage. Much-needed capital and technology flows generate dynamic spillovers that sustain higher growth rates over longer periods. These benefits of integrating developing countries into the global economy are frequently cited, in many diverse forums, from multilateral negotiations to policy discussions in academic circles. Yet there is a lively debate on the best ways to reach these goals.

Since the mid-1960s, special and differential treatment (SDT) of developing countries has been the dominant paradigm within the General Agreement on Tariffs and Trade (GATT)/WTO system to frame policies and discussion on fostering integration of developing countries. The main features of SDT have been market access granted to selective imports from developing countries to developed country markets at tariffs lower than the most favored nation (MFN) levels, without reciprocal concessions; exemptions from GATT disciplines; and more latitude in using certain restrictive trade policies. Although there is an increasing amount of evidence against the efficacy of SDT, strengthening and widening the scope of such provisions continues to be among the central elements of developing countries' agenda in multilateral trade negotiations.

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Critics of SDT point out that it has not delivered the initially promised benefits. The main problem they identify is that SDT is granted unilaterally and voluntarily by the developed countries. Unilateral preferences are not considered binding obligations and are not protected by the GATT legal regime. In practice, donor countries do not implement or maintain preferential market access policies that benefit the recipient countries without demanding something in return. Critics of SDT advocate that developing countries become regular members of the global trading regime with full responsibilities and, therefore, legally protected rights (Krueger 1995; Panagariya 2002; Whalley 1990).

This chapter argues that a major dimension of SDT—unilateral preference programs based on the generalized system of preferences (GSP)—are a failure in part because of the way they are administered. By leaving unilateral preferences outside the scope of the GATT/WTO obligations, developed member countries allow domestic political economy forces to influence the implementation and eventual effectiveness of their preference programs. Since SDT preferences are granted unilaterally and voluntarily by the developed countries, they are not considered binding obligations and are thus not protected by the GATT legal regime.

In contrast, protection of reciprocal obligations through an elaborate dispute resolution process is one of the main features of the GATT/WTO multilateral trade regime. If a country violates its reciprocal market access obligations (or implements subsequent policies that nullify the initial concessions), the adversely affected trading partner can initiate a dispute settlement process, in which a panel decides the case. If the plaintiff is found to be correct, the defendant has to either reverse its policies or face retaliation. Although the multilateral dispute resolution and retaliation processes are by no means perfect, they provide strong enough enforcement powers in most cases for countries to keep their initial market access commitments. Developing countries have no recourse available to them in international law with respect to reversal or elimination of unilateral market access commitments. Hudec (1987) emphasizes that GSP-style programs turned developing countries into “nonpaying participants,” who consequently lost their standing to enforce their legal claims.

Under the GSP, each developed country maintains its own programs, with different product coverage, preference margins, and country eligibility rules. The administrative rules of each preference program give domestic import-competing sectors a privileged voice. In most cases, products in which developing countries have a comparative advantage, such as apparel and agricultural products, are excluded from preference programs from the outset. In other cases, domestic lobby groups exert their influence, and developing countries lose their eligibility when they obtain a large enough export market share in a given product. More important, countries can be completely removed from GSP programs when they become

large enough exporters. The eligibility removal criteria, described below, are specifically designed to take into account the export performance of the recipients. In short, unilateral preference schemes remove tariffs but replace them with (explicit or implicit) quantitative restrictions in which only a limited level of exports is eligible for preferential tariffs. The administrative rules of these preference programs end up replacing one protectionist measure (tariffs) with another (quantitative restrictions). The removal threats naturally reduce the effectiveness of the programs and discourage developing countries from investing in these sectors.

Another effect is on the political economy forces within the recipient developing countries. In most cases, trade policies are determined through a political match between the exporting and the import-competing sectors. Export sectors lobby their governments for liberal trade policies so that they can have access to other countries' markets as part of a reciprocal trade agreement. Import-competing sectors oppose liberalization and lobby for protectionist policies. As Hudec (1987) puts it, nonreciprocal preferences removed an incentive for export industries to oppose protectionist trade policies in their home market. As a result, import-competing sectors dominate the trade policy determination process, leading to more protectionist policies. Furthermore, if there are implicit or explicit quantity limits on the amount of eligible exports, current exporters will earn rents similar to quota rents. Thus they may even have the perverse incentive to lobby their government to limit export growth, as it might lead to the loss of existing preferences and rents. In short, the administrative rules of unilateral preference schemes distort the political economy processes within developing countries against trade liberalization. Since a country's own trade policies are the main determinants of its volume of trade, unilateral preference schemes end up delaying their stated goal of integrating the recipients into the global economy.

Section 6.1 reviews the history of SDT policies within the GATT/WTO framework. Section 6.2 provides a detailed description of the administrative rules governing the preference schemes of the European Union (EU) and the United States, underlining the removal criteria that limit the volume of preference-eligible exports. Section 6.3 analyzes the impact of preferences on eligible countries' export performance, the factors that determine the removal of developing countries from preference programs, and the effect of preferences on recipient countries' trade policies and participation in multilateral negotiations.

6.1 The History of Unilateral Market Access

The intellectual foundations of SDT and preferential market access were laid in the early 1960s by Raoul Prebisch and Hans Singer as part of a larger development strategy. Their main observation was that developing countries' exports were

concentrated in agricultural and mineral commodities with highly volatile prices in the short run and declining terms of trade in the long run. They proposed a development strategy based on import-substitution policies with infant industry protection and preferential access to developing countries' markets. Despite the controversies, which continue until today, the GSP was launched in the mid-1960s, under the auspices of the United Nations Conference on Trade and Development (which was founded and first headed by Prebisch).

One of the main initial criticisms of the GSP was that it clashed with the two main principles of the GATT-based multilateral trade regime: reciprocity, the mechanism through which countries can escape prisoners' dilemma problems in trade negotiations, and nondiscrimination, the main pillar of the regime as encoded in Article I of the GATT. As a result of these inconsistencies, GATT members approved special waivers for the GSP, temporarily in 1971 and permanently in 1979 (as part of the Tokyo Round) through the Enabling Clause. This clause stated that the obligations of the developing countries should be consistent with their development needs. An important feature of the Enabling Clause was that SDT policies would be phased out as the recipient countries reached a certain level of economic development. However, the Enabling Clause lacked effective guidelines on SDT implementation, leaving all decisions on country eligibility, product coverage, and preference margins at the discretion of the preference-granting countries.

The negative effects of GSP became apparent in the Kennedy (1964–67) and Tokyo (1973–79) Rounds of negotiations. The main result was the lack of active participation of the developing countries, which led most tariff reductions to take place in industries that were important to exporters from developed countries. Furthermore, apparel and agriculture, two sectors of significant export interest to developing countries, were burdened with restrictive regimes that shape their global trade until today. The Multifiber Arrangement (MFA) established a global quota regime for apparel and textiles, while all GATT disciplines on agriculture-related policies were effectively eliminated (Hudec 1987). As Hoekman, Ng, and Olarreaga (2002) argue, the continued presence of tariff peaks faced in Organisation for Economic Co-operation and Development (OECD) markets by exporters of apparel, footwear, and similar labor-intensive products produced in developing countries is due partially to their absence from the negotiation table.

Until the Uruguay Round, many new GATT disciplines were implemented on a voluntary basis—only signatory countries were bound by them (Hoekman and Kostecki 2001). The Single Undertaking removed this practice and required all WTO agreements (with a few exceptions on government procurement and civil aircraft) to apply to all member countries, irrespective of their level of development. As a result of the Single Undertaking rule and the negotiation of multilateral

agreements in new areas, such as intellectual property rights and trade in services, many developing countries were faced with significant implementation costs as well as new policy constraints after the entry into force of the WTO.

The burdens of the Single Undertaking were part of the reason for developing country demands to strengthen SDT provisions under the WTO, especially on preferential market access. The 2001 Doha Ministerial Declaration emphasized the importance of SDT, stating that “provisions for special and differential treatment are an integral part of the WTO Agreements.” Paragraph 44 called for a review of SDT provisions, with the aim of “strengthening them and making them more precise, effective and operational.” On the basis of this mandate, developing countries made 88 suggestions to strengthen SDT language in various WTO agreements. The proposals included calls for improved preferential access to developed countries, further exemptions from specific WTO rules, and binding commitments on developed countries to provide technical assistance to help implement multilateral rules (Hoekman, Michalopoulos, and Winters 2004).

Despite intensive talks during 2002, no agreement on these proposals emerged. One reason for this failure was that many of the proposals sought to convert non-binding, “best-endeavors” language into binding obligations on developed countries. Another was disagreement over what types of provisions would promote development. With the collapse of the Cancun Ministerial Meetings, none of these demands was implemented.

6.2 Main Features of Unilateral Market Access Programs

The European Union and the United States established their GSP regimes in the early 1970s. Although Australia, Canada, Japan, and several other countries implemented their own GSP regimes, the European Union and the United States have been, and continue to be, the most important markets for developing countries over the past decades.

The United States’ GSP program is rather straightforward. The program divides eligible countries into two groups—developing and least developed—on their income levels. All eligible countries pay zero tariff on about 4,650 tariff lines, while least developed countries (LDCs) have duty-free market access for an additional 1,750 lines (USTR 2002). Identical products imported from other countries face the higher MFN rates (USITC 2002).

The program took effect in January 1976. The 1974 Trade Act allows the president of the United States to confer GSP eligibility on any country except those that do not offer reasonable and equitable market access for U.S. goods, do not adequately and effectively protect U.S. intellectual property rights, do not reduce

trade-distorting investment policies and export practices, harbor international terrorists, nationalize American property without compensation, are members of a commodity export cartel causing "serious disruption to the world economy," or are Communists (except those with permanent normal trading status). The law stipulates other criteria that may be used in eligibility decisions, such as the level of economic development, protection of workers' and human rights, and whether the country receives preferences from other countries.

One of the key features of the GSP program is that a country may lose eligibility for a product if its exports exceed a certain "competitive need limit," currently \$110 million per tariff line.¹ If the country in question has a market share greater than 50 percent of total U.S. imports in that category, it can lose its GSP eligibility.² The president has discretion over when and how to apply these criteria. In practice, an assistant U.S. trade representative chairs an interagency committee that makes decisions after reviewing petitions from interested parties (the country in question, import-competing domestic firms, relevant U.S. labor unions, intellectual property groups, human rights and environmental nongovernmental organizations (NGOs)). In short, GSP eligibility can be removed at the country, product, or country-product level. Finally, by law certain articles are prohibited from receiving GSP treatment. These include most textiles, watches, footwear, handbags, luggage, and certain apparel. Certain steel, glass, and electronic items designated as import sensitive are also ineligible for GSP.

Since the program was established in 1976, 36 of the 154 eligible countries have "graduated" from the GSP program. Being dropped from the program is often called "graduation," because in many (but not all) cases the stated rationale is a sufficiently high per capita income. Botswana, Hong Kong (China), Malaysia, Mexico, the Republic of Korea, Singapore, and Taiwan (China) all graduated for this reason. Major countries remaining eligible include Brazil, India, Indonesia, the Russian Federation, South Africa, Thailand, and Turkey. Because GSP decisions are legally unilateral, import-competing lobby groups have effectively made GSP the last bastion of truly unregulated protectionism in the United States (Hudec 1987).

The European Union's GSP scheme, first implemented in 1971, is more complicated than the U.S. regime, but has the same basic principles. Whereas the U.S. program grants duty-free market access to all eligible products, the initial EU arrangement classified products into four groups based on the product's "sensitivity." Nonsensitive products enjoy duty-free market access, semisensitive products have a tariff rate that is 35 percent of the Common Customs Tariff (CCT), sensitive products have a tariff rate of 70 percent of CCT, and very sensitive products face a tariff rate of 85 percent of CCT (EC Council Regulation No. 282098, December 21, 1998).

After decades of use, in 2001 this complicated system was simplified considerably. Products were divided into two categories, sensitive and nonsensitive. As before, nonsensitive products, which account for about 32 percent of tariff lines, enjoy duty-free market access. Sensitive products, which account for about 36 percent of tariff lines, receive a flat 3.5 percentage point reduction from the MFN rate (EC Council Regulation No.250101, December 10, 2001).³ Sensitive products are generally products with high MFN rates, implying that the proportionate impact of the preference can be rather small.

Country eligibility for the EU GSP program is similar to that for the U.S. program. Countries that reach a certain level of development are “graduated” from the program. Unlike in the United States, where graduation is determined through a political decision process, the European Union has a more codified approach, in which graduation criteria are determined by indexes. The approach combines the development level and the specialization level of the country:

$$I = \frac{\ln(Y_i/Y_{EU}) + \ln(X_i/X_{EU})}{2},$$

where Y_i/Y_{EU} is gross domestic product (GDP) per capita in the beneficiary country (EU) and X_i/X_{EU} is the manufactured exports of the beneficiary country (of the European Union) to the European Union (beneficiary country). The index increases as the beneficiary country becomes more developed or starts to run a surplus in manufactured goods trade with the European Union. It has a value of zero if the beneficiary country has the same GDP per capita as the European Union and has balanced trade. If the country's per capita GDP exceeds \$8,210 and the index has a value greater than -1 , it is automatically removed from the GSP program. Hong Kong (China), Korea, and Singapore are among the countries that were completely removed from the GSP program based on this criterion.

The second graduation criterion is with respect to individual sectors from individual countries. A specialization index is calculated for this purpose, derived from the relationship between the proportion of imports in a given sector from a given country to total EU imports in that sector and the country's share of total EU imports. A higher index indicates that the country's exports to the European Union are more concentrated in that category.

In 2001 the European Union modified these graduation criteria. The new rules state that countries designated as high-income countries by the World Bank automatically lose eligibility for all products. A country can lose sectoral eligibility under two circumstances. First, a country loses eligibility if it has a development index (I) greater than -2 and it supplies more than a 25 percent share of the European Union's total imports. Second, eligibility is lost if a country has a

development index I greater than -2 , has a sectoral specialization index higher than a threshold level (depending on the actual development index), and it supplies more than 2 percent of the European Union's total imports. In other words, middle-income countries that supply only 2 percent of EU imports can lose eligibility in sectors in which they specialize. As a result, Argentina, Brazil, China, India, Indonesia, Pakistan, Thailand, and many other countries do not have GSP eligibility for a wide range of product categories.

The EU GSP program has many additional features. First, the safeguard clause states that GSP preferences may be suspended for certain products from certain countries if their imports "cause or threaten to cause serious difficulties to a Community producer." The U.S. program, in effect, has the same rule in place, as any producer can petition the U.S. trade representative for GSP privileges to be revoked due to real or potential injury. Second, the European Union has instituted "special incentive arrangements" that reward countries for complying with International Labour Office Conventions, protecting the environment, and combating drug production and trafficking. Countries that benefit from these special arrangements receive additional preferences on certain products in the sensitive list. Finally, as in the U.S. program, additional reasons may lead to withdrawal of preferences. Among these are human rights violations, money laundering, corruption, and violation of various international conventions on the environment.

The most important development in unilateral market access policies since the establishment of the GSP is the implementation of special programs that target specific countries and regions. The United States initiated the Caribbean Basin Initiative (CBI) in 1984 and modified it in 1990. Twenty-four countries in Latin America and the Caribbean are eligible. The Caribbean Basin Trade Partnership Act (CBTPA), passed in 2000, extended the benefits of the original program considerably. In essence, the new rules provide North American Free Trade Agreement (NAFTA)-equivalent treatment for certain items (mainly apparel) that had partial preferences under the original CBI and were excluded from duty-free treatment under the GSP.

Another regional program is the Andean Trade Preferences Act (ATPA), which extends preferences to Bolivia, Colombia, Ecuador, and Peru. Enacted in 1991 as part of U.S. efforts to reduce narcotics production and trafficking, it was modeled after the CBI and has similar eligibility requirements and product coverage. ATPA was renewed in 2002 as the Andean Trade Promotion and Drug Eradication Act and expanded to include tuna, leather, footwear, petroleum products, and apparel—subject, however, to restrictive rules of origin. For example, if apparel is assembled from U.S. fabrics, no quotas or duties apply, but if local inputs are used, duty-free imports are subject to a cap of 2 percent of total U.S. imports (increasing to 5 percent in equal annual installments).

In 2000 the United States passed the African Growth and Opportunity Act (AGOA), which offers beneficiary Sub-Saharan African countries duty-free and quota-free market access for essentially all products. AGOA excludes textiles but extends duty- and quota-free treatment for apparel made in Africa from U.S. yarn and fabric. If regional fabric and yarn are used, there is a cap of 1.5 percent of U.S. imports, increasing to 3.5 percent over eight years. African LDCs are exempt from all rules of origin for a limited period of time, helping to significantly expand apparel exports from countries such as Lesotho.

A key feature of all of these programs, including the GSP, is that they are in effect for a certain period of time and need to be renewed by the Congress periodically after deliberations. In the past, GSP had lapsed twice and was reintroduced retroactively after substantial delay. These additional uncertainties about the future of preference programs further lower the incentives to invest in eligible sectors to increase export potential in the long run.

The European Union's largest program is the Lomé/Cotonou Convention for countries in Africa, the Caribbean, and the Pacific, which is, in contrast to the GSP, a contractual relationship. These countries are granted preferences that often exceed those available under the GSP. Most industrial products have duty- and quota-free market access; the preferences are less comprehensive for agricultural products. In 2000 duties were still applied to 856 tariff lines (837 of which were agricultural products). Of these, 116 lines were excluded from the Cotonou Agreement. An additional 301 tariff lines were eligible for reduced duties, subject to specific quantitative limits (tariff quotas) set for countries in Africa, the Caribbean, and the Pacific as a group. The remaining 439 products were eligible for reduced duties without quantitative limits.

In March 2001 the European Union introduced, formally as part of its GSP scheme, the Everything But Arms (EBA) initiative. This program grants duty-free access to imports of all products from LDCs except fresh bananas, rice, and sugar, for which liberalization is delayed. Tariffs will gradually be reduced to zero in 2006 for bananas and in 2009 for rice and sugar, while tariff quotas for rice and sugar will be increased annually. A key feature of the EBA is that, in contrast to the GSP, preferences are granted for an unlimited period and are not subject to periodic review.

6.3 The Impact of Preferences on Exports of Eligible Countries

A key issue in the analysis of unilateral preferences is their effect on the export performance of eligible countries. Most studies of the GSP are critical of their effects on export performance. GSP often fails to cover products in which beneficiary states have the greatest comparative advantage, such as textiles and apparel

TABLE 6.1 Key Products without GSP Preferences in the European Union and the United States, 2001

Product	Total imports (\$ billions)		Market share of GSP recipients (%)	
	EU	U.S.	EU	U.S.
Dairy products	1.4	1.2	15	11
Textiles and yarn	15.3	9.6	42	21
Apparel and clothing	48.7	60.8	54	47
Leather products	6.1	7.6	74	24
Footwear	6.5	16.1	67	18
Ceramics and glassware	6.2	8.7	27	13

and agriculture (Devault 1996; Ray 1987). In 2000, for instance, just 47 percent of the \$175.6 billion of U.S. imports from GSP beneficiaries were in tariff lines listed under the program (USITC 2002). This can be clearly seen in table 6.1, which lists the product categories in which GSP recipients have a large share of total imports of the United States and the European Union. In some cases developing countries face even higher average tariffs than are reported, because of the composition of their exports. Furthermore, some of the subcategories include high tariff peaks, which further restrict exports of developing countries. The primary reason for this pattern is that there is strong domestic opposition to liberalization in developed countries in these sectors. It is also partly a result of the limited participation by developing countries in reciprocal negotiations.

By invocation and even more by anticipation, the export ceilings on GSP product eligibility are often binding (Finger and Winters 1998; MacPhee and Rosenbaum 1989). The complexity of the system (especially the rules of origin and related paperwork) and the lack of technical capacity of developing country exporters inhibit full use of GSP preferences, even when eligibility is not a problem. The rules of origin are imposed to prevent transshipment—that is, the reexport of products produced in ineligible countries that face higher tariffs. Rule-of-origin requirements and related inspection procedures can be quite costly—and at times explicitly protectionist in intent. A prominent example is the United States' triple transformation rule in apparel preferences, which requires imported clothing to be made from textiles produced with yarn spun in either the preference-granting or the beneficiary country.

Rules of origin are likely to be a major reason why many eligible products do not enter developed country markets under preferences. Instead, exporters prefer to pay the applicable MFN tariff. Except for certain alcohols, sugar, flowers, and

TABLE 6.1 (Continued)

Market share of LDCs (%)		Average tariff rate (%)		Average tariff rate faced by GSP recipients (%)	
EU	U.S.	EU	U.S.	EU	U.S.
1	1	9.9	13.4	15.9	19.7
3	1	5.4	7.8	4.6	7.2
8	7	10.2	15.3	8.8	15.9
1	1	2.3	10.4	1.9	11.5
1	1	7.5	10.6	7.4	10.0
1	1	5.1	6.3	3.8	8.2

Source: World Integrated Trade Solutions database.

Note: GSP countries only; LDCs may obtain deeper preferential treatment. For GSP market share, China is included for the European Union but excluded for the United States.

jewelry, less than one-third of eligible exports from GSP-beneficiary countries entered the United States under any preference program in 2001 (table 6.2). In the case of sugar and fresh flowers, the low GSP ratio is due to utilization of other unilateral programs, such as the Caribbean and Andean preference schemes, of the United States. In these cases the share of exports entering under GSP provisions is exceptionally low, either because of exclusions or because rules of origin make participation too costly. An indicator of the restrictiveness of these rules is that only 65 percent of apparel exports from Latin America and the Caribbean enter the United States under the preference programs, despite a preference margin of more than 20 percent and the restrictive MFA quotas on excluded countries.

Another problem, as Clark and Zarrilli (1992) demonstrate empirically, is that GSP donors disproportionately substitute nontariff for tariff protection on sensitive GSP-eligible products. Given these factors, it is not surprising that numerous empirical studies have concluded that GSP has radically underperformed, yielding at best a modest increase in imports from beneficiary states, with some of those gains due merely to trade diversion (Brown 1987, 1989; Grossman 1982; MacPhee and Oguledo 1991; Sapir and Lundberg 1984). As noted by Whalley (1990), available quantitative studies tend to conclude that SDT (GSP in particular) has had only a marginal effect on the economic performance of beneficiaries. Even where they may be significant, GSP benefits are highly concentrated, as most preferential imports come from a handful of developing countries. For years these were Hong Kong (China), Korea, Singapore, and Taiwan (China). But even in

TABLE 6.2 Preference Use by GSP Recipients in the U.S. Market, 2001

Category	Total imports (\$ billions)	Imports from GSP recipients (\$ billions)
Cut flowers	0.72	0.43
Prepared fish	0.72	0.47
Cane or beet sugar	0.56	0.41
Fruit and nuts	0.78	0.34
Unmanufactured tobacco	0.75	0.58
Acrylic alcohols	1.56	0.73
Ethers and ether alcohols	1.78	0.34
Carboxylic acids	1.64	0.73
Trunks and suitcases	4.59	1.17
Leather articles	2.68	0.52
Plywood and panels	1.10	0.46
Footwear	13.87	2.39
Apparel, knitted	25.00	11.50
Apparel, not knitted	35.10	15.90
Hats and headgear	0.96	0.33
Jewelry articles	5.40	2.10

Figure 6.1 GSP Imports in the U.S. Market, by Country, 2001

Source: USITC Web site (<http://www.usitc.gov>).

2001, just 5 countries accounted for 59 percent of U.S. GSP imports, and 10 countries accounted for 80 percent (USITC 2002) (figure 6.1).

A final issue concerns the impact of preferences on the overall export performance of eligible countries. The share of LDCs in total imports of the European Union and the United States has not increased significantly in the past 20 years or so

TABLE 6.2 (Continued)

Share imported under GSP (%)	Share under all preference programs (%)	Average applied tariffs on all imports (%)
3	95	6
7	13	9
29	77	6
20	33	15
3	7	68
55	94	5
84	84	5
4	4	5
0	6	10
18	21	8
18	22	5
0	1	11
0	25	14
1	15	14
0	2	7
54	70	6

Source: USITC Web site (<http://www.usitc.gov>).

Note: Table reports data on imports (at the four-digit Harmonized Commodity Description and Coding System classification) of products on which the United States applied tariffs of more than 4 percent in 2001 and GSP recipient countries had significant exports to the United States.

(figure 6.2). This is not necessarily a reflection of ineffective preference schemes, as these countries have had preferential access for many years. This is a problem for assessing the effect of preferences, as the vast majority of developing countries were in the program from the very beginning. (In practice, empirical work must start in 1976, as detailed pre-1976 data are either not available or not reliable.) Countries that joined after 1976 or that were never in the program are either members of the Organization of Petroleum Exporting Countries (OPEC) or have dictatorial (or communist) regimes. In other words, they are not an unbiased sample of developing countries. Furthermore, graduation from GSP may be associated with the developing countries concerned becoming “regular” GATT/WTO members, which have greater incentives to offer reciprocal market access to other members.

One way of evaluating the effect of preferences is to compare the performance of countries during GSP years with the performance after a country has been removed from the program. Three separate measures of export performance are analyzed in figure 6.3, which compares performance among countries that were

Figure 6.2 Share of LDCs in Total Imports of the European Union and United States, 1986–2002

Source: UN Comtrade database.

Figure 6.3 Export Performance of Countries Dropped from and Remaining Eligible for U.S. GSP

Source: Author's calculations.

dropped from U.S. preference programs (GSP, CBI, AGOA) with that of countries that were not dropped. The first measure is aggregate exports divided by GDP, the most common method used in the literature. The second is industrial exports divided by GDP. This measure is used because the preference programs are specifically designed to increase the industrial exports of developing countries. Agricultural products are generally excluded, while other natural resources (metals and minerals) already face low tariffs. Thus if the preference programs have any positive impact, it should reveal itself in the industrial exports measure. The effects of commodity price fluctuations can also be assessed by using this measure. The third measure is the annual growth rate of aggregate real exports.

Export performance of preference recipients improves significantly once their eligibility is withdrawn. Özden and Reinhardt (2004) perform an econometric analysis of this issue, correcting for the complication of endogeneity of preference status, among other potential confounding factors. They show that the pattern shown in figure 6.2 is quite robust and that removal from unilateral preferences leads to superior export performance.

6.3.1 Removal from Preferences

What factors cause donor states to withdraw countries wholesale from eligibility for unilateral preferences? A number of statutory criteria govern donors' discretion in this regard. These criteria are unique to each donor state, since they are purely self-imposed. For all donors, however, a chief criterion is a recipient's level of development. Humanitarian provisions, such as the need for recipients to avoid child and slave labor and to apply minimum standards for worker rights, are also formally part of many donors' statutory criteria.

Yet donors do not always, or even usually, strictly follow their own statutory criteria in making eligibility decisions. These criteria allow a great deal of latitude for the government's interpretation, which is inevitably skewed by political pressures arising from a variety of sources. As argued at the outset, a major source of such pressure is the classic and well-understood resistance to market openness voiced by import-competing producers in the donor state's economy. To a lesser extent, donors may attempt to use preference eligibility as an incentive for recipient governments to adopt desired trade-related policies in specified areas, such as, most prominently, intellectual property standards. In addition, to varying degrees, donors also treat eligibility for preferences as a form of foreign aid, providing a carrot to friendly regimes and a stick to countries whose noneconomic policies are objectionable for one reason or another.

Figure 6.4 sheds some light on the weight of some of these political and economic factors in the U.S. government's calculus over country-level GSP eligibility. It shows

Figure 6.4 Characteristics of Countries Retained and Dropped from U.S. GSP

Source: Özden and Reinhardt 2005.

Note: Figure gives average annual values, counting only the years in the interval 1976–2000 during which each country was eligible for the U.S. GSP preference. It includes 118 countries that were never dropped from GSP and 34 that were ultimately dropped. It excludes Israel and Mexico, which were dropped after forming a free trade area with the United States. ILO = International Labour Organization; WIPO = World Intellectual Property Organization.

average annual statistics, from 1976 through 2000 (where available), on a number of factors related to U.S. GSP withdrawal decisions, for countries dropped and never dropped from GSP. It examines the years leading up to, not after, GSP withdrawal for countries that were dropped, to allow an even comparison. During the years in which they were eligible for U.S. GSP preferences, countries that ultimately were dropped receive not only slightly more than half of the amount of bilateral U.S. military and economic foreign aid from the United States, as those that were retained on GSP. That is, if a recipient receives a great deal of nontrade-related foreign aid from the United States, it is much more likely to retain its preferences. Countries targeted by non-GSP-related foreign policy sanctions—for example, for allegedly sponsoring or shielding transnational terrorists—are also more likely to have their GSP eligibility cut.

Figure 6.4 also provides clear signs that the United States has used GSP to compel countries to upgrade their intellectual property standards. Countries that joined the World Intellectual Property Organization, for instance, are notably less likely to have been dropped from the preference program.⁴ Last (and perhaps least, weighed against the causal importance of these other reasons for removal), failure to sign the three fundamental International Labour Organization

Figure 6.5 Increases in Exports for Countries Eligible for and Dropped from GSP

Source: USITC trade databweb.

Note: Figure shows the annual average increase in bilateral exports to the United States for years in the interval 1976–2000 during which each country was eligible for U.S. GSP. It includes 114 countries never dropped from GSP and 28 that were ultimately dropped. It excludes Israel and Mexico, which were dropped after forming a free trade area with the United States.

conventions banning forced and child labor exposes a country to a greater chance of GSP withdrawal.

Figure 6.4 strongly suggests that these foreign policy–related criteria are associated with U.S. decisions to drop countries from preference eligibility. This is not a terribly surprising conclusion. Politics has a clear part in this governmental decision, just as it does in most others. One of the biggest predictors of GSP removal, however, is the size and increase in a country's exports to the United States. Figure 6.5 shows that in the years leading up to their withdrawal, countries ultimately dropped from GSP saw their real exports to the United States grow by three times as much as countries that were not dropped. Like other trade policies, GSP eligibility is strongly affected by classical political economy pressures opposing imports. The only difference is that the removal of GSP preferences is unconstrained by the international legal regime and thus offers a very tempting first issue for import-competing producers in donor states to lobby against.

6.3.2 Preferences and Recipient Countries' Trade Policies

One of the unintended consequences of unilateral preferences is that they may lead to more protectionist trade policies in recipient countries, because the preferences affect the process by which trade policy is determined in the recipient

Figure 6.6 Performance Indicators for Countries Eligible for and Dropped from GSP

Source: Özden and Reinhardt 2005.

developing countries. Numerous theoretical and empirical studies argue that reciprocal negotiations generate trade liberalization in part by mobilizing export interests to lobby their own governments for trade liberalization so that they can have access to other countries' markets in return (see Hoekman and Kostecki 2001). Preferences reduce the incentives for domestic exporters to mobilize and participate in the domestic decision process, which may now be dominated by the import-competing sectors. Moreover, exporters that obtain preferential access enjoy quota-like rents, since the preference schemes resemble quantitative restrictions. The possibility of removing the preferences and the resulting loss of these rents if exports were to expand substantially may further reduce exporters' incentive to lobby for lower barriers.

The impact of preferences on recipient countries' trade policies can be seen in figure 6.6 for three measures of trade policies. The figure compares performance between countries removed from the U.S. GSP program on the one hand and the same countries before removal plus all countries that were never removed on the other. All of the data are averaged over country years. There is a large debate over what the best measure is for trade policy, as each suffers from different biases (Rodríguez and Rodrik 2001). Duties/imports might understate protection if some tariffs are prohibitive and no duties are collected, while the average nominal tariff attaches the same weight to small- and large-volume categories. The most

commonly used measure of trade policy, imports/GDP, is biased against large countries, which tend to trade less. These shortcomings notwithstanding, countries dropped from GSP adopt more liberal policies. Özden and Reinhardt (2005) perform a comprehensive econometric analysis of this issue, using these and other measures of trade policy and correcting for potential endogeneity of the preference status.⁵ Their analysis confirms that removal from unilateral preferences leads to trade liberalization. Domestic trade policies affect developing countries' trade volumes and growth prospects more than the barriers they face in their export markets. Thus the perverse incentive effects of the unilateral preferences may be quite damaging and significantly reduce the benefits of preferential access.

6.3.3 Preferences and Recipient Countries' Participation in Multilateral Negotiations

Preferential market access may also lower the incentives for developing countries to actively participate in multilateral negotiations. In part, this may be due to their belief that they will not receive further market access concessions or because of their concern over the erosion of their existing preferences as a result of nondiscriminatory liberalization by developed countries. The erosion of preferences may also create conflicts of interest between preferred and nonpreferred developing countries. If the export products are similar and have low margins, even small preferences could make a difference for some countries and fuel conflicts of interest.

An example of this problem appears in the apparel sector. Under the provisions of AGOA, 36 countries in Sub-Saharan Africa are eligible to export apparel products to the United States without any tariffs or quantitative restrictions. Twenty-four countries in Latin America and the Caribbean enjoy similar privileges under the CBPTA. Through bilateral NAFTA preferences and unilateral Caribbean and African preferences, beneficiary countries managed to increase their share of U.S. apparel imports to about 32 percent (figure 6.7). All of these countries risk losing their preference margins if protectionist policies of the United States against excluded countries, especially in East Asia, are reduced. Özden and Sharma (2004) find that export prices in the CBI countries declined 24 percent in categories where the MFA quotas were removed, completely eliminating the benefits of preferential access.

Sugar is another example in which a few countries enjoy rather valuable preferences while others face significant barriers. It is estimated that free trade in sugar markets would result in a 38 percent increase in world prices, a 20 percent increase in trade, and global welfare gains of about \$4.7 billion (Beghin and Aksoy 2005). Brazil, one of the largest low-cost producers, would enjoy an income gain of about \$1.6 billion. A few middle-income countries with relatively high production costs

Figure 6.7 U.S. Imports, by Exporting Country, 1989–2001

Source: USITC trade databweb.

receive rather large quotas in highly protected markets, such as the European Union. Mauritius, for example, receives 38 percent of EU quotas (Mitchell 2003). Mauritius and other countries receiving preferences will confront much greater competition in the EU market and lose their current gains when duty- and quota-free access is granted to all LDCs in 2009. The analysis of the sugar market confirms the conclusions of the many studies on preference programs that find that they generally yield modest export increases (at best) and that a significant portion of these gains is due to trade diversion from excluded developing countries.

6.4 Concluding Remarks

The integration of developing countries into the global economy, especially through increased international trade, is a commonly cited and shared objective. One of the dominant paradigms of the past 40 years, SDT, in particular the associated unilateral market access preferences, does not seem to have delivered on its initial promises. A large literature on the reasons for this failure documents that preference schemes have tended to exclude the products that matter most for poor

countries, are uncertain (benefits can be and are taken away), may be accompanied by tight rules of origin that preclude their use, and lock countries into trade patterns that generate low added-value.⁶ We argue that among the main culprits is the way these programs are administered. The administrative rules of these programs allow the political economy forces within donor and recipient countries to negatively influence their implementation.

These findings have far-reaching implications for the multilateral trading regime. Recent decades have witnessed the proliferation of discriminatory and nonreciprocal preferences that push the letter and the spirit of the WTO rules to their limits, undermining the core nondiscrimination principles of the multilateral regime. Discriminatory, nonreciprocal programs can damage trade liberalization efforts considerably. Trading partners, especially developing countries, have no avenues for protecting their rights when market access commitments are breached, since these GSP programs are permitted by the WTO. This leads to exclusion of export sectors of developing countries from preferences or their removal when they increase, under the influence of import-competing sectors of developed countries. Recipient countries also end up implementing more protectionist policies and are less likely to actively participate in multilateral negotiations.

In this chapter, we presented some well-known evidence that important sectors are excluded from unilateral preferences, only a few countries are actual beneficiaries, and utilization levels are not high, even in eligible product categories, due largely to rules of origin restrictions. The most interesting finding is that superior export performance is one of the reasons for removal from GSP programs and that these countries adopt less protectionist trade policies themselves after removal. The link between export performance and removal from GSP is an explicit part of the preference schemes. The evidence suggests that developing countries may find it in their interest to revisit their insistence on SDT and non-reciprocal preferential access to export markets.

Notes

1. This level was much lower—about \$70 million—until a few years ago.

2. However, there is a *de minimis* waiver. The president of the United States has the discretion to waive the competitive need limit if total U.S. imports in a category from all countries (both GSP eligible and ineligible) do not exceed \$16.5 million (in 2003).

3. For silk products and certain apparel categories, the preference margin is 20 percent of the MFN rate if the products are in the “sensitive” category. If specific duties are applied, they are reduced by 30 percent. If both *ad valorem* and specific tariffs are applied, the specific duty is not reduced. The remaining 32 percent of tariff lines have an MFN rate of zero.

4. Singapore, for example, was told to upgrade its intellectual property standards in the late 1980s in order to retain GSP eligibility. It did so reluctantly, though it was cut off a year later nonetheless.

5. This was done by lagging all explanatory variables by one year and by using an instrumental variables approach to isolate the treatment effect of GSP status on trade policy. The methodology used

is similar to a Heckman selection model but with observed trade policy outcomes even for countries that do not obtain GSP. A number of exogenous variables can be used as predictors of GSP status that are independent of (can have no influence on) a developing country's trade policy. These include other foreign policy-determined sanctions, whether a country has a formal alliance with the United States, the rate of GDP growth in the United States, and a very long (three-year) lagged GSP status.

6. See Baldwin and Murray (1977) and Langhammer and Sapir (1987) and the references cited there for early discussions and reviews of the literature. Hudec (1987) remains an authoritative assessment. Hoekman and Özden (2005) survey more recent literature.

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MAINSTREAMING ECONOMIC DEVELOPMENT IN THE TRADING SYSTEM

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Arguments for giving special consideration in trade negotiations to the interests of developing countries can be traced back to the earliest days of the formation of the General Agreement on Tariffs and Trade (GATT) (see chapter 5). Special and differential treatment (SDT) measures for developing countries in the World Trade Organization (WTO) include preferential market access, longer tariff phase-down periods and flexibility in the implementation of WTO disciplines, and offers by developed countries to provide technical assistance and capacity building to developing countries to facilitate the implementation of WTO agreements. Arguably, these measures have not succeeded in addressing fundamental inequities in the trading system. Developed countries have continued to protect their markets and distort global trade in key sectors, stifling the development prospects of developing countries. The large disparities in negotiating power have resulted in unbalanced rules, with overall benefits that are skewed toward developed country interest groups. Given that the WTO is an important component of the system of global governance, the perceived imbalances in its power structures raise questions about the inclusiveness of its decision-making processes and the legitimacy of negotiated trade agreements.

The debate about development in the WTO is often assumed to be about increasing the effectiveness of SDT. This perception relegates the debate about development to the margins of the WTO, in that it is an afterthought—a “nice thing to do” or an “optional extra.” This perception of the development dimension

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is too narrow. Developing countries have fundamental interests in the WTO that require a broader focus than SDT. What follows argues that the development dimension of the WTO comprises four key elements: fair trade, capacity, balanced rules, and good governance. These principles are informed by Amartya Sen's definition of development as the process of expanding human freedoms (Sen 1999). These freedoms include elementary capabilities, such as being able to avoid deprivations such as starvation and to enjoy political participation. Human freedom is both the pre-eminent objective and the means of achieving development.

Four types of "unfreedoms," or deprivations, are relevant to a discussion of development and the multilateral trading system. First, Sen (1999) argues that deprivations can result when people are denied the economic opportunities and favorable consequences that markets offer and support (that is, fair trade in the sense of equality of opportunity). Second, poverty should be understood not so much in terms of low incomes but as a deprivation of basic capabilities (that is, trade capacity). Third, government regulation is needed to enable markets to work more effectively, and a system of ethics (basing public policy on social justice) is required to build vision and trust for the successful use of the market mechanism (that is, balanced rules in the sense of pursuing greater equity). Fourth, Sen argues that denying people of basic civil rights and the opportunity to participate in crucial decisions regarding public affairs is to deny the right to develop and strengthen a democratic system, an essential part of the process of development (that is, open, transparent and participatory decision making).

Fair trade can be defined as the removal of obstacles to developing country exports to developed country markets. Increasing the capacity of developing countries, especially the poorest and most marginalized, to exploit their comparative advantage would enhance human, institutional, productive, and export capabilities, thus leveling the playing field in the trading system. Establishing rules that ensure a fair balance between the costs and the benefits of WTO agreements, with appropriate flexibility for developing countries, would bolster the legitimacy and sustainability of the rules. By improving the governance of the WTO through a more transparent and inclusive system of decision making, the capacity of developing countries to participate effectively will be enhanced. In this context, SDT can be seen as a tool for ensuring proportionality of trade agreements, commensurate with the levels of development. However, SDT on its own is an inadequate concept to promote development objectives in trade. It must be part of a broader approach that is consistent with the four principles of fair trade, capacity building, balanced rules, and good governance in the WTO.

The concept of the development dimension proposed here is not exclusive to developing countries. Advancing the development dimension in the WTO is of systemic interest to all members—developed and developing—wanting to build a

more legitimate and stronger multilateral rules-based system. While the WTO is a trade negotiating body, not a development institution, most members locate their mercantile interests within a broader strategic set of objectives (Government of Sweden 2002). Developed countries also have good reasons to advance the multilateral trading system (Mendoza 2003). Such a system restrains inefficient protectionism in their domestic economies, reduces costly trade wars, and increases global growth. Addressing the development dimension will contribute to the stability and legitimacy of the trading system. Contributing to the growth and development objectives of the WTO is a shared systemic objective, recognized in the Doha Declaration, which calls for the system to play “its full part in promoting recovery, growth, and development.”

7.1 The Global Context and the Debate on Trade and Development

Globalization has provided increased opportunities for the development prospects of many developing countries, but a large number of countries, especially in Africa, have failed to take advantage of these opportunities, increasing their marginalization in the world economy. A response to these unbalanced developments has included unprecedented mass action by civil society groups, as witnessed by the demonstrations seen in the past five years at major international meetings of the WTO, World Bank/International Monetary Fund (IMF), and the G-8. Much of the critique has centered on the so-called Washington consensus, which was in stark contrast to the successful development experiences of East Asian economies, where the state played a leading role in guiding the market (Wade 1990).

In *The Roaring Nineties*, Joseph Stiglitz (2003) argues that the United States got the balance between state and markets wrong in its domestic policy and inappropriately pushed the free market Washington consensus internationally, calling for free trade, deregulated financial markets, and the privatization of state enterprises. He points to the lack of coherence in U.S. policy: while pushing for the ideology of free market, the United States “did not think about the impact of our policies on the poor in developing countries, but on job creation in America” (204). In the area of trade, he argues that “the completion of the Uruguay Round turned out to be one of our greatest failures . . . the U.S. pushed other countries to open up their markets to areas of our strength . . . but resisted efforts to make us reciprocate” (206).

The resulting double standards are reflected in a number of Uruguay Round agreements. The Agriculture Agreement calls for developing countries to open their markets, but it does not reduce much the huge subsidies and high tariffs that depress global prices and undermine the development potential of developing countries. In industrial products, developed countries retained above average

tariffs, tariff escalation, and tariff peaks for labor-intensive products—areas in which most developing countries have a comparative advantage.

The Trade-Related Investment Measures (TRIMs) Agreement restricted the scope for policy intervention to support industrial development, despite the use by developed countries of similar instruments in their own economic development strategies in the past—thus kicking the ladder behind them (Ha-Joon 2002). The Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS) also reflected a lack of attention to balancing the potential benefits of increased research with the costs of reduced competition and monopoly power granted to pharmaceutical-producing countries by patent rights (Ismail 2003b). Product standards often reflect the prevailing norms and interests of the larger developed countries, which negotiate mutual recognition agreements with one another but not with poor countries, thus increasing barriers to entry for the latter (Ismail 2003b).

Since the creation of the GATT in 1947, the multilateral trading system has been seen as a vital part of the system of global governance in the economic area, together with the Bretton Woods institutions (the International Monetary Fund and the World Bank). However, developed countries have contested the legitimacy and political credence of the GATT/WTO, both in domestic debates about sovereignty and in the use of unilateral trade measures (such as Sections 201 and 301 of U.S. trade law) (Chen 2004). Developing countries have also contested the challenge to their sovereignty of new rules, such as the TRIPS Agreement, as well as proposed disciplines on the so-called Singapore issues in the Doha Development Agenda. There has been wide and increasing convergence among WTO members on the need to strengthen the multilateral trading system and its rules.¹ This extends to decision making. Although the WTO has been relatively successful in developing a consensus-based decision making system, major setbacks for the institution (for example, Seattle and Cancun) have caused some members, most notably then European Union (EU) Commissioner Pascal Lamy, to criticize its system of decision making as “medieval.” Others perceive that the interests of major developed countries (EU members, the United States) dominate. The formation of the G-20 and other developing country alliances (the G-33, the G-90, and so forth) can be seen as a positive development to counterbalance this reality.

7.2 Four Elements of the Development Dimension

A systemic response is called for to respond to these critiques. Notwithstanding the wide divergences in policies and interests of developed and developing countries, there exist significant areas of convergence. A multilateral trading system needs to be built around these systemic concerns, values, and interests. If taken seriously, the four proposed elements of the development dimension—fair trade,

capacity building, balanced rules, and good governance—can help increase the development relevance and legitimacy of the trading system. Each of these elements is discussed below, first in general terms, then in terms of the July 2004 Doha Work Program (the “July Package”), which established the negotiating modalities for moving the Doha Round forward (WTO 2004).

7.2.1 *Fair Trade*

A number of studies have demonstrated that the gains from globalization and international trade are not equal and that the lion’s share of the benefits goes to the developed countries (World Bank 2004). While this is due partly to the vast differences in economic power and levels of development of WTO members (economic size), it also reflects the inequitable trade and economic policies of developed countries, which impose negative externalities on developing countries. Domestic trade policies distort global markets. By removing these distortions and achieving greater coherence in global economic policy—especially between trade and development assistance policies—developed countries can contribute significantly to development by allowing the forces of comparative advantage to work. Such a policy would stimulate growth and increase global economic welfare for both developed and developing countries.

The required changes to their domestic and international policies have been extensively analyzed by researchers. A vast literature suggests that the protectionist policies of developed countries in agriculture, for example, are highly distorting and impose substantial costs on farmers in developing countries. These policies are also inefficient and ineffective in providing support to rural communities in Organisation for Economic Co-operation and Development (OECD) countries—as Patrick Messerlin notes in chapter 1, much of the benefits are captured by the richest farmers and landowners. Moreover, these policies have done little to correct market failure, instead exacerbating environmental damage by encouraging ever more intensive production techniques (Tangerman 2004). High-level commissions such as the United Nations (UN) Millennium Trade Task Force (2005) and the Commission for Africa (2005) have pointed the way forward with specific policy proposals, including the abolition of trade-distorting support in the OECD, liberalization of access to service markets through temporary movement of providers and cross-border trade, and greatly expanded investments in infrastructure and capacity building. Movement in the direction proposed in these reports would contribute significantly to the effective and sustainable integration of developing countries into the world economy.

The devastating negative development impact of the agricultural policies of the developed countries has been widely criticized (Oxfam 2002). They prompted

James Wolfensohn, the former president of the World Bank, to remark that protectionist policies are “crippling Africa’s chance to export its way out of poverty” (*International Herald Tribune*, July 6, 2003). The WTO needs to ensure that the policies of the developed countries—the major beneficiaries of globalization and the dominant forces in global trade—are consistent with the WTO objective of liberalizing *global* markets and allowing the exports of developing countries to grow and develop.

A major objective of the Doha Development Agenda is to reduce the use of global trade-distorting policies, including in agriculture. Progress has proved difficult, with much resistance on the part of major developed countries to move forward rapidly and to accept binding disciplines on policies such as export subsidies for agricultural products. This resistance was reflected in the absence of agreement on negotiating modalities until mid-2004. Only in July 2004 was a framework agreement concluded that addresses negotiating modalities for agriculture.

The text provides some promise that the principle of fair trade will be taken more seriously. The framework includes a number of provisions that go beyond traditional SDT. The market access modalities allow developing country members to designate special products to which liberalization would not apply, based on the criteria of food security, livelihood security, and rural development needs. In applying these criteria, WTO members would take the level of a country’s development and its vulnerability into account.

Discussions and analysis during 2002–04 clearly revealed the importance of disciplining trade-distorting subsidies, which can and do negatively affect the livelihoods and development prospects of the poorest developing countries. By refusing to deal with this issue separately, the United States illustrated the link between fair trade and development. In this area, of great importance to West African cotton producers, progress is now inextricably linked to an ambitious and successful outcome of the Doha agriculture negotiations. The WTO did make an important advance in recognizing the complementarity between the trade and development aspects of the cotton crisis confronting West African producers, created in part by the subsidies of OECD members.²

In the case of the Non-Agriculture Market Access (NAMA) negotiations, the debate on the substance of the “framework” was postponed, although it was subsequently made clear that a formula approach would be pursued (see chapter 3 of this volume). The modalities for liberalization in NAMA will need to simultaneously address the issues of tariff peaks, tariff escalation, and the remaining high tariffs that prevent developing country exports into developed country markets and ensure sufficient flexibility to accommodate the range of levels of development of developing countries.

While much was left vague and for future negotiation, the framework provides scope for fulfilling the Doha mandate’s promise of fair trade and development in

agriculture by recognizing that the complete elimination of export subsidies is an objective and by ensuring that the principle of proportionality is applied to developing country commitments. Clearly, however, much will depend on the ultimate outcome, including in particular the extent to which OECD countries limit the extent of liberalization in their markets through exemptions for “sensitive products” and through “reinstrumentation” of policies (such as an expansion of allowed Green or Blue Box subsidies). These issues are discussed in chapters 1 and 3.

7.2.2 Capacity Building

For many developing countries, especially the most marginalized, increased market access will not contribute significantly to export-driven growth. Their capacity to export is constrained by a range of supply-side factors, including lack of infrastructure, low research and innovation capacity, lack of access to finance, and a weak investment environment. Poor institutional capacity and human resources contribute to this lack of supply capacity. The weak fiscal base of these countries and the huge needs in health, education, and other social expenditure areas reduce the capacity of the state to intervene to build these capabilities. In addition, the adjustment costs and fiscal impact of trade liberalization make these governments reluctant to reduce their tariffs. Moreover, for a significant number of countries the prospect of erosion of existing trade preferences in developed country markets has made them reluctant to support multilateral liberalization.

The WTO cannot ignore these realities. Building institutional, productive, and export capabilities is vital to effectively integrate developing countries into the global economy. The WTO has recognized this. In the case of cotton and West Africa, it has worked closely with the development community, including multilateral and bilateral agencies. Its members have recognized that the WTO has a role in building institutional, productive, and export capabilities and that it should share some responsibility for the development impacts of trade.

This points to a need for a global effort to expand funding for building trade capacity. Increased financial support for trade policy capacity building has to come from additional sources of funding. Gordon Brown, the British chancellor of the exchequer, has called for the creation of an international finance facility that would provide long-term donor aid to frontload the funding available. This fund could generate an additional \$50 billion a year toward financing progress toward the Millennium Development Goals, including trade-related capacity building (G. Brown 2004). In the spirit of the Marshall Plan—the U.S. program to finance the development of a ravaged postwar Europe—Brown has urged that other forms of funding also be considered.³ As Prowse discusses in chapter 8, there are a variety of ways in which to redistribute some of the gains that will accrue to rich countries from a successful Doha Round. Doing so would constitute an

important step forward in helping enhance the capacity of developing countries and thus the legitimacy of the trading system.

The Doha Declaration states that “technical co-operation and capacity building are core elements of the development dimension of the multilateral trading system.” It recognizes that “sustainably financed technical assistance and capacity building programmes have important roles to play.” The July 2004 package calls for “developing countries and in particular least developed countries to be provided with enhanced Trade-Related Technical Assistance (TRTA) and capacity building to increase their effective participation in the negotiations, to facilitate their implementation of WTO rules and to enable them to adjust and diversify their economies.” In addition, a section on “other development issues” commits WTO members to ensure that “special attention shall be given to the specific trade and development related needs and concerns of developing countries, including capacity constraints.” The July text therefore took on board the need to address implementation and supply-side needs of developing countries, in addition to the more traditional capacity building to strengthen negotiation skills.

In an annex on modalities for trade facilitation (see chapter 9 of this volume), assurances are provided to developing countries that the cost implications of any agreement—implementation needs and priorities, technical assistance, and support for capacity building, including infrastructure development—will be addressed by developed country members. In an important innovation, this annex states that in the absence of adequate support, implementation obligations will be waived for developing countries. These provisions lay the basis for the possibility that new rules will be more balanced, in the sense of providing for the building of needed capabilities in developing countries, particularly the least developed, to allow them to benefit more fully from trade opportunities.

The July text also recognized the problem of preference erosion, to be addressed in the agriculture and NAMA framework agreements and in a section on development. While preference erosion is an important issue for a number of poor countries, for most countries the larger challenge is to exploit market access opportunities by addressing supply capacity constraints. A range of measures may need to be applied to assist these countries in managing their adjustment and implement diversification strategies. These could include funding from the Bretton Woods institutions, but grant-based development assistance would be preferable.

In applying these strategies, the WTO would need to fully implement the concept of coherence in multilateral decision making. Decisions made in the WTO would need to be coordinated with the other Bretton Woods institutions and vice versa. This would require the WTO to build formal relationships with institutions

that have expertise in building supply-side capabilities for the countries most in need (Prowse 2002). An appropriate mechanism in the WTO to advance these new approaches would need to be built. Some WTO members (the Africa Group) and outside observers have proposed creating a monitoring mechanism that would evaluate the capacity constraints of these developing countries and recommend both more coherent strategies with other development agencies and temporary flexibility from WTO rules and obligations. This proposal needs to be seriously considered (Hoekman 2005).

7.2.3 *Balanced Rules*

Globalization has led to increased but more volatile flows of trade and finance. In parallel with Amartya Sen's call for market regulation at the national level to ensure social justice, these international flows require regulation to protect the environment, animal and human health, and poor and vulnerable households from systemic risks (ILO 2004). The need for such regulation also applies to multilateral trade rules. If these rules are not perceived to be balanced and to promote the interests of developing countries, they will lack legitimacy and ownership.⁴ It is in the interests of all that WTO rules take into account the need for flexibility for less developed members without weakening the effectiveness of the rules-based system.

This can be achieved if rules recognize that the interests of developed countries and developing countries may not converge entirely. This suggests the need to develop mechanisms to ensure that careful consideration be given to assessing the development impact of new disciplines to make the benefits and costs transparent. Such mechanisms are important both to provide a basis for greater flexibility in implementation (if actual benefits turn out to be less than costs) and to allow the link to be made to implementation assistance if capacity is lacking. More generally, rules should permit judicious intervention where appropriate to achieve economic development objectives. However, calls for increased flexibility ("policy space") by developing countries need to be balanced against the equally important need to ensure that the multilateral rules-based trading system is not weakened. If it is not, the stronger and more powerful countries may resort to unilateral measures, discriminating against weaker developing countries (Hoekman 2005).

The Doha mandate recognized developing country criticisms that many of the rules inherited from the Uruguay Round—for example, TRIPS and TRIMS—were imbalanced and needed to be reviewed. Thus the Doha mandate agreed "that negotiations on all outstanding implementation issues shall be an integral part of the Work Programme." In addition, the concerns of developing countries about the effectiveness of the existing SDT provisions were to be addressed by reviewing all existing SDT provisions "with a view to strengthening them and making them

more precise, effective and operational.” While some progress was made on SDT in the course of negotiations between 2001 and 2004, negotiations on outstanding implementation issues and concerns were held hostage by a debate on the extension of the scope of geographical indications, an issue strongly supported by the European Union and Switzerland.

In the agriculture framework negotiations, developing countries in the G20 were successful in ensuring that the approaches towards domestic support and export competition took into account the principle of proportionality and the levels of development and vulnerability of developing countries. On domestic support, it was agreed that “developing countries that allocate almost all *de minimis* support for subsistence and resource-poor farmers will be exempt.” On export competition, it was agreed that export subsidies for developing countries could be maintained for a longer period (to be negotiated) and that state trading enterprises in developing countries that preserved “domestic price stability and food security” would receive special consideration.

The NAMA framework proposal recognized that reducing tariff barriers alone will not succeed in providing genuine market access for developing countries. Nontariff barriers such as antidumping, technical barriers to trade, and import licensing in developed countries often pose significant barriers to developed country exports. Thus WTO members will need to ensure that the outcome of the NAMA negotiations also includes more balanced rules that support the effort made in the market access negotiations and do not continue to impede the exports of developing countries in an unfair manner.

7.2.4 Good Governance

The emergence of stronger developing country alliances and negotiating groups has begun to provide a more effective counterbalance to the power of the European Union and the United States, as well as the opportunity for shared leadership.⁵ Some WTO observers have argued that the key to development is empowerment, that is, giving to the poor the means to seize opportunities, improve their standards of living for the long term, and voice their expectations and aspirations (Engammare and Lehmann 2004). Only by participating actively in the negotiations can developing countries effectively articulate their interests and engage with other countries to negotiate fair and sustainable compromises. Thus the functioning of the WTO has to ensure that the principles of transparency and inclusiveness are adhered to. Transparency and inclusiveness have to be practiced both in the negotiating process and in the substantive implementation of rules.

The lack of transparency of the implementation obligations of developed countries was one of the reasons for the frequent circumvention of Uruguay

Round commitments and obligations on agriculture (Tangerman 2004). In the negotiations over the July 2004 Agriculture Framework, developing countries insisted and obtained agreement that the transparency and monitoring of commitments in the areas of domestic support, export competition (subsidies), and market access would be enhanced. In both the agriculture negotiations and NAMA, developing countries displayed unprecedented negotiating capacity and solidarity. While they succeeded in obtaining a fairer and more balanced outcome, it was widely felt that the negotiating process was not very transparent and needed to be improved. The detail and complexity of the negotiations and the differences in interests among members of the G20 required great transparency and inclusiveness, which was achieved. However, other major groupings—such as the Africa Group, the African, Caribbean, and Pacific Group, and the least developed countries (LDCs)—were largely left out of these negotiations.

Significant progress in terms of transparency and inclusiveness was made in the negotiations on trade facilitation. Learning the lessons of the failure of the Cancun Ministerial Meeting, the developed countries did not underestimate the strong views and concerns of many developing countries. The resulting agreement on negotiating modalities on trade facilitation modalities takes into account these concerns, as illustrated in the link to assistance for implementation.

Despite the progress made, in part as the result of the formation of negotiating groupings of developing countries, it is clear that the legitimacy of the WTO and the sustainability of its decisions require it to develop a more inclusive and democratic decision making system. Doing so would help improve global governance. Responding to civil society criticism as well as to the failure of several ministerial meetings, the director-general of the WTO, Dr. Supachai Panitchpakdi, asked his consultative board, chaired by Peter Sutherland, to make proposals for more effective and democratic decision making in the WTO.

The report of this body was released in late 2004. It begins by making the case for liberalization and strengthening of the most favored nation (MFN) (or nondiscrimination) principle of the WTO. It goes on to consider a number of issues currently debated among WTO observers, including the issue of sovereignty, the WTO's relationship with civil society, and the operation of the dispute settlement system. More relevant to the question of good governance of the WTO, the board reviewed decision making in the WTO, variable geometry and plurilaterals, the role of ministers and ministerial conferences, the relationship between senior capital-based officials and Geneva-based diplomats, the role of the secretariat and the director-general of the WTO, and the need to strengthen coordination and coherence between the WTO and other relevant multilateral agencies and bodies. Each of these recommendations is considered briefly below.

Decision making. The board supported the consensus approach generally followed by the WTO and suggested ways in which this could be improved. It argued that more procedural decisions should be separated from substantive decisions. In the case of procedural decisions, the WTO should resort to other forms of decision making, such as voting (provided for in Article IX of the WTO treaty). The board also recommended that to resort to blocking measures (such as a veto by a single country to prevent consensus) by some countries, the country seeking to block a decision should be required to declare in writing that the matter is of vital national interest to it. If adopted, this measure could help the WTO strengthen the consensus approach to decision making and address the frustration of WTO members when confronted by efforts of large members to block consensus where the underlying reasons are extraneous to trade issues.

Variable geometry. The board addressed the call by some members to develop a differentiated (plurilateral) approach to issues on which only a subset of members is able and willing to deepen liberalization and rulemaking. The board took a cautious approach to this possibility, suggesting further deliberation. It was judicious in taking this approach, as WTO members are currently very divided on this issue, with many suspicious that variable geometry would create a two-speed or two-track system, compromising the principle of inclusiveness.

Ministerial involvement. The board recommended an annual meeting of trade ministers and more regular and incremental decision making on issues by ministers rather than recurring large and complex trade rounds. It also called for a summit of WTO members to be held every five years. The recommendation to depoliticize the ministerial conferences of the WTO will be welcomed by most governments that have experienced the failure of past WTO conferences. However, holding a summit every five years is probably still premature. Before that can happen, the trade agenda will need to have become more manageable and less politically divisive.

Increasing participation of senior capital-based policy makers. The board recommended creating a consultative body made up of about 30 countries, with the majority of seats filled on a rotating basis. This recommendation is likely to be very controversial among WTO members, as it will raise even more sharply the criticism that the WTO lacks transparency and inclusiveness in its decision making.

Role of the director-general and the secretariat. The board proposed an enhanced role for the director-general, without eroding the character of the WTO as a member-driven organization. It recommended that the director-general continue to chair the Trade Negotiating Council and that this role be extended to the General Council. The board also proposed that the director-general and the

secretariat act as the guardians of the trading system. The secretariat is called upon to play a more active role in formulating trade policy and engaging with other institutions on behalf of members.

These recommendations should be supported and taken forward by WTO members. However, the need for the WTO to converge internally on a minimum set of trade policy guidelines as well as a broad vision is essential for building an *acquis* that the director-general and secretariat can advance on behalf of the membership. It will be essential for the WTO director-general to provide leadership and establish a minimum level of trust among members so that such an *acquis* and vision can be built.

Greater coherence between the WTO and other multilateral agencies. The board made two bold proposals. First, it recommended that a stronger WTO secretariat and a more active director-general engage with other multilateral institutions and take the lead on trade policy issues. Second, the board recognized that the WTO cannot meet the challenges of trade liberalization through trade policy reform and related institutions by itself. It proposed greater horizontal coordination with UN agencies and the Bretton Woods institutions. The board called for these multilateral bodies, especially the World Bank, to put in place programs to fund adjustment assistance for developing countries.

Both recommendations are bold and timely, and they should be welcomed as a positive contribution to strengthening global governance and mainstreaming development in the multilateral trading system. Developing countries have in the past been critical of the Bretton Woods institutions' attempts to impose trade policies that are inconsistent with their development needs and prejudge their WTO positions. Many developing country members would therefore appreciate action by the WTO to build greater coherence in multilateral trade policy making. In addition, in raising the need for a major effort to be made at the multilateral level to build an adjustment support mechanism for poorer developing countries, the board has identified a major factor that could assist many developing countries in managing the liberalization process more effectively, as long as the process occurs within the framework of their national development strategies (see also chapter 8 by Susan Prowse, below).

7.3 Concluding Remarks

Strengthening the development dimensions of the multilateral trading system is a systemic issue that concerns both developed and developing countries. Of course, as Engammare and Lehmann (2004) stress, the WTO is not a panacea, and it certainly cannot guarantee development. As many have argued, while good trade policies may be a necessary condition for economic development, they are not a

sufficient condition. A successful development strategy at the domestic level will require a range of other policies that are implemented in an integrated manner, especially to ensure that the gains from trade are distributed more evenly and contribute to poverty reduction. However, the Doha Round can and should provide a framework to help contribute to reducing poverty. In committing the world to reduce poverty by half by 2015, world leaders at the UN Millennium Summit in September 2000 included as one of the goals that of developing an open, rules-based, predictable, nondiscriminatory trading and financial system. At the 2002 Monterrey Conference on Financing for Development, these same world leaders agreed to forge a partnership between developed and developing countries—the Millennium Development Compact—to advance the Millennium Development Goals. The Doha Development Agenda should be seen in this context, as the WTO is an essential part of the global effort needed to achieve these aims. Long-term initiatives to halve hunger and poverty will fail without a fundamental restructuring of the global trading system, particularly in agriculture, that includes rich countries dismantling trade-distorting subsidies, lowering tariffs, and leveling the playing field (M. Brown 2003).

The July 2004 decision by the General Council saved the WTO from another collapse and ensured that the members were still on track, albeit much delayed, to achieve the objectives of the Doha Development Agenda. In doing so, WTO members made a significant contribution to the development dimensions of the multilateral rules-based system. The July 2004 work program extended the Doha Development Agenda to the Sixth Ministerial Meeting, to be held in Hong Kong (China) in December 2005. While it is too much to expect that the Doha Development Agenda could be concluded by this date, the groundwork was laid to advance the agenda. In addition to deadlines for modalities in agriculture and NAMA, a new work program is needed to ensure that some of the other areas of the agenda that were not part of the July Package—such as rules, services, and TRIPS—also gain some momentum.

Progress and the successful conclusion of the Doha Round will depend on political will in the European Union, the United States, and other OECD countries to make the needed market access concessions and to take actions that move the system closer to consistency with the four elements of the development dimension. In particular, the European Union, with its 25 member states, will need to develop the political will to negotiate an ambitious agreement in agriculture in line with its commitments in the Doha mandate. Progress will also depend on the ability of the U.S. administration to obtain a renewal of fast-track negotiating authority (trade promotion authority).

An outcome that moves the trading system toward greater consistency with development principles will depend first and foremost on developing countries.

They need to maintain the momentum of negotiating efforts and strengthen their delicately knit alliances on different issues. The success of the G-20 in the agriculture negotiations shows what can be achieved. This model will need to be built on, strengthening the alliance with the Cairns group and the G-33 and G-90 groups of countries, thereby creating greater equality in bargaining power between developed and developing countries in the WTO. Vigorous debate within these groups should result in balancing both the interests of developing countries for a more open trading system, including among themselves, and the need for greater flexibility for less developed members. The active participation of civil society groups, including the private sector, in developed and developing countries, to ensure that the voice of those seeking a fairer, more balanced, and strengthened multilateral trading system prevails over protectionist lobbies will be crucial for the successful outcome of the Doha Round and the legitimacy of the trading system.

Notes

1. See the European Union response to the panel report on Section 201 safeguard cases, reported in Chen (2004).
2. See 1b. and Annexes A and 5 of WTO (2004).
3. There are several good reasons why the international community should address these challenges. Among them is the impact of OECD agriculture protection, which is responsible for a loss by developing countries estimated at \$100 billion a year (Oxfam 2002), an amount equivalent to twice the annual development aid developing countries receive.
4. Developing countries have called for a review and renegotiation of the Uruguay agreements on TRIPS, antidumping and countervailing duties, and other issues. They also made 88 proposals to review the application of SDT provisions of the WTO, arguing that SDT has not been effective.
5. The emergence of the G-20 since Cancun and the inclusion of Brazil and India in the non-Group of Five countries that negotiated the agriculture deal in the July Package was largely successful in providing developing countries with leadership and negotiating leverage. Most WTO members criticized this type of small group negotiation as untransparent and exclusive.

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“AID FOR TRADE”: A PROPOSAL FOR INCREASING SUPPORT FOR TRADE ADJUSTMENT AND INTEGRATION

Susan Prowse

A Doha reform package can be expected to generate sizeable gains to both developed and developing countries. But implementing the trade reforms will impose economic and social costs on some countries and require them to take complementary actions. Taking advantage of improvements in market access will entail domestic policy reform to facilitate trade, and it will require trade-related capacity building. Strengthening development assistance support to ensure that promises of aid are forthcoming and undertaken within a coherent policy framework could improve the negotiating dynamics and development relevance of the World Trade Organization (WTO).¹ An expanded allocation of aid to support trade on a multilateral basis could also help offset the current system of highly discriminatory trade preferences.

This chapter looks at the case for additional support for trade adjustment and integration. Section 8.1 outlines the economic and political rationale for proposing additional support for trade adjustment and integration—aid for trade. Section 8.2 identifies the potential gains from multilateral trade liberalization to both developed and developing countries. It reviews how developing country strategies address

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trade and investment policies and examines existing support for trade reform and integration. It suggests that resources are inadequate, that increased support for trade reform and integration will benefit not only the recipient country but also the global economy as a whole, and that such resources should be genuinely additional to existing aid budgets. Section 8.3 discusses options for leveraging additional support and reviews efforts to increase aid effectiveness by improving coherence and coordination in trade-related assistance. Section 8.4 assesses a possible operational framework to deliver greater aid for trade and discusses how it can be integrated into the existing trade, development, and financial architecture.

8.1 The Case for Support for Trade Adjustment and Integration

The multilateral liberalization envisioned under the Doha Round is expected to produce significant global gains for both developed and developing countries. But negotiations will involve deeper commitments on a broad range of issues. The trade reforms will therefore require adjustment, and taking advantage of improvements in market access will require developing countries to undertake behind-the-border policy reform and capacity building.

Current trade negotiations and empirical evidence have brought to the fore the debate on the need to address adjustment costs and provide support for trade integration arising from a Doha Round agreement. What is the economic and political economy case for additional support?

8.1.1 The Economic Case for Support

As a result of global reforms, preferential access to markets will be eroded and import prices of some staples may rise. Liberalization will also give rise to adjustment costs.

Preference erosion. Preferential access has become a key issue on the Doha Agenda. This partly reflects increasing dissatisfaction by countries excluded from preferences accorded to other countries. It also reflects fears of the impact of most-favored-nation (MFN) liberalization on the preference margins currently received by some developing countries and least developed countries (LDCs).

The real costs of preference erosion can include a range of factors and be less than the notional preference margin. These factors include actual utilization, which has often been relatively limited (UN Millennium Project 2005) and the extent to which rents actually accrue to producers in the poorest countries. Preferences often apply to highly protected sectors in donor countries, resulting in high rents that are captured predominantly by importers (distributors, retailers, distribution subsidiaries of producers) (Tangermann 2002).²

Analysis suggests that preference erosion is a significant economic issue for only a limited number of countries, most of them middle-income countries. Erosion of preferences—both the Generalized System of Preferences (GSP) and deeper, more recent preferences, such as Everything But Arms and the African Growth and Opportunity Act has a substantial impact on some countries, especially those with high concentrations of exports in heavily protected commodities. The number of countries in this position is small (Alexandraki and Lankes 2004; IMF 2004). The problem is heavily concentrated in small island economies dependent on sugar, bananas, and to a lesser extent garment exports, goods on which protection—and therefore preference margins—is high (table 8.1). Preference-dependent or sensitive countries include Cambodia, Cape Verde, the Comoros, Haiti, Malawi, Maldives, Mauritania, São Tomé and Príncipe, and Tanzania (Stevens and Kennen 2004). The limited number and small size of most of

TABLE 8.1 Estimated Decrease in Average Export Unit Values Following a 40 Percent Cut in Preference Margins as a Result of Multilateral Tariff Reduction

Least developed countries		Other developing countries	
Country	Percent	Country	Percent
Malawi	6.6	Mauritius	11.5
Mauritania	4.8	St. Lucia	9.8
Cambodia	4.1	Belize	9.1
Bangladesh	3.9	St. Kitts and Nevis	8.9
Maldives	3.5	Guyana	7.9
Haiti	3.3	Fiji	7.8
Cape Verde	3.3	Dominica	5.5
São Tomé and Príncipe	2.7	Seychelles	4.2
Tanzania	2.4	St. Vincent and the Grenadines	3.4
Comoros	2.0	Jamaica	3.3
		Albania	3.3
		Nicaragua	3.2
		Swaziland	3.0
		Serbia and Montenegro	2.9
		Tunisia	2.2
		Côte d'Ivoire	2.2
		Morocco	2.1
		Dominican Republic	2.1

Sources: Alexandraki and Lankes 2004; Page and Kleen 2004.

Note: Only preference erosion with respect to Canada, the European Union, Japan, and the United States is considered. Calculation of current preference margins uses tariff data per two-digit product category for each preference scheme. Direction of trade data is then applied to obtain a trade-weighted preference margin.

the economies concerned imply that measures to help mitigate the impact of preference erosion can be closely targeted at the countries at risk (Alexandraki and Lankes 2004). The only large country expected to suffer from preference erosion is Bangladesh, which has benefited significantly from the textile quota restrictions imposed on other large competitive developing countries, such as China, which are due to be removed at the end of 2004 under the WTO Agreement on Textiles and Clothing.

The costs of preference erosion need to be set against gains from MFN liberalization, both for the recipient country and for other developing countries and LDCs. The evidence suggests that preference erosion is unlikely to be a major issue for many countries once the compensatory effect of broad-based multilateral liberalization is taken into account (Francois, Hoekman, and Manchin 2005). Under a variety of scenarios, developing countries would receive tens of billions of dollars in welfare gains from an across-the-board reduction in MFN rates. For example, a 50 percent reduction in agricultural and industrial tariffs would potentially yield welfare gains of \$28 billion for developing countries, more than nine times the loss associated with the complete removal of GSP schemes (Lippoldt and Kowalski 2003). However, this is not to deny the need to assist affected countries to address preference erosion costs through expanded development assistance (Hoekman and Prowse 2005).

Effects on net food importers. The reduction in tariffs, domestic support, and export subsidies for agricultural products (notably by developed countries) that would arise from a successful trade round would affect other countries largely through higher international prices of previously protected and supported products. Net exporting countries would benefit from an increase in international prices and would export more, while net food importers would lose by paying higher prices for agricultural imports. Within these countries, liberalization would benefit producers and hurt consumers. On balance, for net food importers, consumer losses would outweigh producer gains, so overall these countries would be worse off. For net exporting countries, producer gains would outweigh consumer losses, leaving these countries better off.

Research indicates that although agricultural trade liberalization would not raise import costs in many net food-importing countries, a number of countries, mainly in the Middle East and North Africa, and small island economies that must import significant quantities of agricultural goods would be hurt by liberalization, especially by liberalization of grains (wheat and maize) (Eiteljörge and Shiells 1995; Tokarick 2003).³

Undoubtedly, as is the case for countries that are affected by preference erosion, financial and policy support will need to be given to the small number of

poor countries that could see sizable increases in their import bills. These costs should not deter progress in liberalizing agricultural commodities, however, as they need to be considered in the context of the gains from broad-based MFN liberalization. If, for example, industrial countries were to remove support to their cotton sectors, the world price of cotton would rise, increasing export earnings of many poor countries in West Africa and Central Asia that are net exporters of cotton. This would offset some of the increase in food import costs borne by these poor countries following liberalization of food products. Benin, Burkina Faso, Côte d'Ivoire, Mali, Pakistan, Syria, and Uzbekistan would benefit from particularly large gains in export revenues from liberalization of cotton (Tokarick 2005).

Own liberalization: Macroeconomic trade-offs and adjustment. Trade liberalization may well lead to higher trade deficits and perhaps balance of payments difficulties. Consequently, trade measures may need to be accompanied or supported by currency devaluation and domestic tax reform. Currency devaluation has consequences for inflation and stabilization and may reduce tax revenue further. In terms of devising a program of trade liberalization, policy makers need to take into account the relationship between trade liberalization, the exchange rate, and tax revenues.

The evidence suggests that tariff revenues depend on the structure of the tariff and customs regimes. Trade taxes represent one-quarter to one-third of total tax revenue in some low- and middle-income developing countries (Commission for Africa 2005; IMF 2004). Mobilizing alternative sources of revenue therefore is important in countries, particularly low-income countries, in which tariff revenues constitute a high component of total public sector resources.⁴ Appropriate fiscal measures can more than offset the erosion of trade taxes. These measures include moving toward a more uniform tariff structure, eliminating exemptions, improving the administration of tariffs and taxes, and strengthening domestic taxation (Ebrill, Stotsky, and Gropp 1999; Tarr 2002). Through timely and complementary fiscal reform programs, middle-income developing countries as well as several low-income developing countries (for example, Pakistan and Uganda) have largely succeeded in recovering tax revenue lost from reducing trade taxes. Their experience suggests that reform of the domestic tax system should be undertaken in parallel with trade reform, not necessarily delayed until afterward, in order to increase the credibility of the liberalization process and reduce the likelihood of a reversal. Generally, revenue recovery requires a committed and continuous effort to broaden the tax base by eliminating exemptions, simplifying rate structures, improving administration, and strengthening domestic consumption taxes, such as excise or value-added taxes (IMF 2004).

An appropriate real exchange rate to ensure export competitiveness is important; a real depreciation may be necessary to underpin successful trade reform (World Bank 2001). Domestic price inflation and an exchange rate that is grossly over- or undervalued or particularly volatile will distort the relative price signals that are critical for taking advantage of trade liberalization to reallocate resources more efficiently into the tradable goods and services sectors (WTO 2005). A competitive and stable real exchange rate and domestic price stability underpin investor confidence in establishing a long-term export capability and ensure that producing tradable goods and services can be profitable over time. Inconsistent or erratic macroeconomic policies can reduce the credibility of the reform program and lead to a reversal in trade policy as a result of political resistance. An overappreciation of the exchange rate is liable to lead to lower overall tax revenues. Consequently, trade liberalization needs to be accompanied by appropriately supportive monetary policies to preserve the tax yield (Agbeyegbe, Stotsky, and Mariam 2004).

The vast theoretical and empirical literature on this subject is clear: the costs associated with designing and implementing appropriate (compensating) tax, monetary, and exchange rate policy are temporary, but the gains they induce through improved allocation of resources are permanent and significantly exceed the temporary costs. From an economic standpoint, these costs should not be seen as an obstacle to liberalization but as a necessary investment for longer-term gains. (For a comprehensive review of the literature, see OECD 2004.)

Trade reform as necessary but not sufficient. The need for explicit support for trade and integration goes well beyond dealing with adjustment to preference erosion and macroeconomic trade-offs. No country has developed successfully by turning its back on international trade and long-term capital flows. The evidence does suggest the need to place trade reform in the broader context of a development strategy that will allow a gradual opening to imports and foreign investment as the complementary behind-the-border institutional and social structures are put in place.

Gains from trade liberalization are conditional on an environment that allows the associated movements of labor and capital across sectors to occur, encourages the needed investment in new sectors of activity, and provides the vulnerable with some assurance that they will be assisted if necessary (Hoekman and Winters 2004). Insofar as these conditions are not met, complementary reforms need to be implemented before and in conjunction with trade reforms. Policy needs to be designed to offset to the extent possible any major negative impacts global reform may have on a substantial part of the more vulnerable in society. Some governments will have the capacity to redistribute some of the local gains, while others may confront significant constraints (UN Millennium Project 2005).

In low-income countries in particular, social insurance and adjustment assistance mechanisms may be weak or not exist; if they do exist, they may provide only partial compensation for adjustment-related losses incurred by workers and households. There may also be doubts regarding the creation of new employment opportunities, especially in environments characterized by very weak investment climates. This reality makes complementary reforms to increase the likelihood of realizing the benefits from trade reforms particularly important.

The same is true for understanding the effects of trade liberalization on poverty. Aside from the obvious moral imperative, ensuring that trade reforms will help achieve poverty reduction goals is important to facilitate broad ownership of reforms, thereby making them more sustainable. Many developing countries (notably the poorest) are ill equipped to take full advantage of new trade opportunities because of significant supply-side and institutional constraints (World Bank and IMF 2005). Improved market access without the capacity and transportation to sell is not much use.

Exporters in landlocked countries often find their shipments held up at roadblocks in transit countries (for example, Kyrgyz truckers are stopped by traffic police and environmental inspectors throughout Kazakhstan). Recent research by the United Nations Conference on Trade and Development (UNCTAD) (2004) estimates that international transport costs for imports of landlocked African countries account for an average of 20.7 percent of the value of their imports—a much higher figure than the world average of 5.1 percent and the average for African countries of 12.7 percent. UNCTAD notes that access to high-frequency, reliable, low-cost liner shipping services largely determines a country's connectivity to overseas markets and thus its competitiveness in global markets.

Similar work by Fink, Mattoo, and Neagu (2002) suggests that for the majority of U.S. trading partners, transport costs outweigh tariff barriers. Countries in Africa normally absorb all or most of their own transport costs of exporting. Africa's net freight and insurance payments in the 1990s were about 15 percent of the total value of the region's exports; for Africa's landlocked countries the figure was 40 percent. For developing countries as a whole, the equivalent figure is about 5 percent, implying that in order to be competitive, an average producer in Africa has to be about 10 percent more efficient than firms in other developing countries (about 35 percent more efficient if the producer is in a landlocked African country) (World Bank 2001).

The list of beneficial concomitant reforms can be long, but most of the policies are additive to those of trade liberalization, in the sense that they do not give rise to trade-offs (Hoekman and Winters 2004). Moreover, there is evidence that openness can induce improvements in other policy dimensions. Aside from the importance of sound macroeconomic management and the effective provision

and adequacy of social safety nets, policy action may be necessary to ensure that markets continue to function or develop (Winters 2002). Internal reform to reduce and remove as far as possible internal constraints is a valuable companion to the process of external liberalization.

The regulatory environment can discourage investment and therefore the reallocation of resources necessary for an economy to benefit fully from trade liberalization. Trade cannot play much of a positive role if the macroeconomic climate is unstable and the business environment hostile, leading to high transactions costs. Complicated and costly customs clearance procedures, complex and nontransparent administrative requirements, high costs of processing information on goods and services crossing borders, and uncertainty about the enforceability of legal trade documents are all regarded as high on the list of problems that can add significantly to the transactions costs of engaging in international trade (Commission for Africa 2005; WTO 2005).

8.1.2 The Political Economy Case for Support

Even accepting that trade is likely to generate global gains, the distributive and redistributive dimensions of trade integration need to be taken into account if the political viability of the process is to be ensured (Verdier 2004). Simply pointing to the growth induced by trade and investment openness and the implied aggregate welfare gains will not be enough to make trade acceptable to critics of global integration.

Historically, providing significant assistance has been important in helping persuade countries to adopt more democratic, open, market-oriented systems. As Wolf (2004) notes, the European Union (EU) provides a system of “jurisdictional convergence.” Members are obliged to accept freedom to trade, migrate, and move capital. In exchange the European Union has provided an “extraordinarily successful machine” for integrating poorer members and helping them converge with the richer states. This process took place in Italy in the 1950s and 1960s and in Greece and Ireland in the 1980s and 1990s; and it no doubt will occur for the 10 new members in the coming decade. Liberalization policies were combined with economic assistance to the weaker countries and regions (through the Structural and Cohesion Funds, which account for about 35 percent of the EU budget), helping shape positive popular perceptions of integration (Sapir 2000; Tsoukalis 2003). The postwar Marshall Plan was instigated in large measure to neutralize the forces moving Western Europe away from multilateral trade (Foreman-Peck 1983) and to thereby facilitate global economic recovery. Between 1948 and 1952, it provided about \$13.0 billion, representing several percentage points of U.S. gross domestic product (GDP) (Price 1955).

8.2 Redistributing Some of the Gains From Trade

Estimates of the gains from liberalization vary, depending on the assumptions used. Anderson (2004) provides a comprehensive overview of research undertaken. Table 8.2 summarizes this research, showing the comparative static estimates of economic welfare gains from full multilateral liberalization and from a 50 percent multilateral liberalization of goods and services trade. For the world as a whole, most of the estimates are in the \$200 billion–\$350 billion range. After full adjustment to a 50 percent reform, the unweighted average of the highest and lowest estimates provides a comparative static gain of 1.8 percent of GDP for the world as whole, 1.6 percent for developed countries, and 2.5 percent for developing countries (Anderson 2004).

These estimates ignore possible dynamic productivity gains, exploitation of economies of scale, and benefits from improved competition and liberalization of trade in services, including greater temporary international mobility of service suppliers. Taking these factors into account would greatly increase the potential aggregate gains. For example, estimates of global gains from deep liberalization that includes induced productivity effects and services liberalization exceed \$1 trillion (Anderson 2004; Anderson, Martin, and van der Mensbrugghe 2005; Bergsten 2005) and range up to \$2.1 trillion (Brown, Deardorff, and Stern 2003).

Even allowing for economic costs associated with reform and social and environmental costs, the positive impact of further trade reform remains sizable. Table 8.3 summarizes the net benefits from halving subsidies and trade barriers and from achieving only a 25 percent liberalization. The most conservative estimates assume that the probability of a successful Doha Round is low, that it may take years to complete, that full implementation is not likely to occur by 2010, that the reduction in subsidies and trade barriers will be considerably less than 50 percent, and that dynamic gains would boost GDP growth rates by less than one-sixth for developed countries and one-third for developing countries. Even under these assumptions, the net present value estimates are still very large, both absolutely and relative to the cost associated with reform. Moreover, the benefit would be even larger if the counterfactual was not the status quo but a rise in protectionism and a decline in the WTO and the rules-based global trading system it supports.

While the overall magnitude of gain is difficult to accurately assess, the research results are very clear: further trade liberalization on a multilateral basis will bring large gains. The extent to which such gains can be realized in practice, notably in low-income developing countries, depends on the complementary policy actions taken to improve the investment climate, build trade-related capacity, and meet

TABLE 8.2 Comparative Static Estimates of Economic Welfare Gains from 100 Percent and a 50 Percent Global Liberalization of Trade in Goods and Services

Study	Market assumptions
<i>Complete liberalization</i>	
Anderson, Martin, and Mensbrugghe (2005)	Constant returns to scale, perfect competition
Brown, Deardorff, and Stern (2003)	Increasing returns to scale, monopolistic competition, firm-level differentiated products
Francois, van Meijl, and van Tongeren (2003)	Increasing returns to scale, monopolistic competition, firm-level differentiated products
World Bank (2003)	Constant returns to scale, perfect competition
World Bank (2003)	Constant returns to scale, perfect competition plus productivity boost
<i>Successful Doha Round (50 percent liberalization)</i>	
Brown, Deardorff, and Stern (2003)	Increasing returns to scale, monopolistic competition, firm-level differentiated products
Francois, van Meijl, and van Tongeren (2003)	Increasing returns to scale, monopolistic competition, firm-level differentiated products
Francois, van Meijl, and van Tongeren (2003)	Constant returns to scale, perfect competition
Harrison and others (2004)	Constant returns to scale, perfect competition

adjustment costs. This behind-the-border agenda will require additional support and resources. The fact that in absolute terms developed countries would gain economically even more than developing countries from multilateral trade liberalization means that they should be able to provide even more support, development assistance, and foreign direct investment (FDI), further reducing global income inequality and poverty (Anderson 2004).

Potential aggregate net real income gains will be complemented by a reduction in poverty, thus helping achieve the Millennium Development Goals. According to Oxfam (2002), if Africa, East Asia, South Asia, and Latin America were each to increase their share of world exports by 1 percent, the resulting gains in income

TABLE 8.2 (Continued)

Sectors liberalized	Baseline year	Welfare gain, non-OECD (\$ billions)	Welfare gain, global (\$ billions)	Year of currency
Goods only	2005	108	254	1995
Goods, services, and FDI	2005	431	2,080	1995
Goods and services	1997	113	367	1997
Goods only	2015	184	355	1997
Goods only	2015	539	832	1997
Goods and services, including FDI	2005	216	1040	1995
Goods and services	1997	88	196	1997
Goods and services	1997	51	132	1997
Goods only	1997	97	186	1996

Note: Welfare figures are based on the compensating equivalent variation methodology.

could lift 128 million people out of poverty. In Africa alone this increase in trade would generate \$70 billion, about five times what the continent receives in aid. However, the poverty impact of trade reform and increasing export performance is highly conditional on complementary actions being taken in poor countries to support the needed integration response and adjustment. Research also suggests that a less ambitious set of reforms—for example, a 40 percent average cut in bound tariffs that does little to lower applied tariffs in developing countries or continued protection of agriculture in the Organisation for Economic Co-operation and Development (OECD) plus limited action on services and trade

TABLE 8.3 Costs and Benefits of Liberalizing Subsidies and Trade Barriers, 2002

(\$ billions)

Scenario	Benefit (net present value in 2005)	Cost (net present value in 2005)	Benefit/cost ratio	Key assumptions
<i>Full reform:</i> 100 percent liberalization of trade barriers and agricultural subsidies	46,080	2,104	21.9	Discount rate is 5 percent. Benefits rise each year, even after the five-year phase-in to 2010 (because the economy is growing) and last to 2050. Costs are \$583 billion a year and last from 2006 to 2010.
<i>Successful Doha:</i> 50 percent liberalization of trade barriers and agricultural subsidies	23,040	947	24.3	As above except costs are \$219 billion a year.
<i>Unsuccessful Doha:</i> 25 percent liberalization of trade barriers and agricultural subsidies	11,520	395	29.2	As above, except costs are \$91 billion a year.

Sources: Anderson 2004; Brown, Deardorff, and Stern 2003.

facilitation—would generate disproportionately smaller benefits, if any, for the poorest countries. Indeed, a Doha reform package that entails low-income countries not doing anything to improve their policy regimes may result in lower real incomes in many of these countries—that is, it could retard rather than spur development (World Bank and IMF 2005).

Seen in this context, supporting trade adjustment and integration requires a shift toward more efficient transfer and assistance mechanisms, with support directed at priority areas defined in national development plans and strategies and clear accountability on the delivery of assistance (Hoekman and Winters 2004). What takes place in practice tends not to support this policy prescription. To date promoting trade and investment within a country's national development strategy

has been weak. Recent reviews of Poverty Reduction Strategy Papers (PRSPs) continue to indicate that the productive sectors and the growth agenda receive limited attention. Trade concerns, when they are expressed in PRSPs, do not necessarily result in trade-related investments (Capra International 2003; Hewitt and Gillson 2003; World Bank 2004). In part this is because investment needs for trade compete with other much-needed country-level investments in such areas as health and education, which donors have been actively pressing developing countries to undertake. At the same time, overall aid and rates of investment have not been growing in the LDCs. Although awareness of trade issues among key multilateral agencies, donors, and developing countries has been increasing, commitments to trade-related assistance and capacity building remain low.⁵ When developing countries choose to make trade a part of their development strategies, donors should ensure that support is provided to enable them to respond to the opportunities trade liberalization can bring. The issue is not trade or aid but rather how can aid be provided so that it enables countries to translate opportunities to trade into economic growth and poverty reduction (Hudson 2005).

Aid for Trade—A Win-Win Policy Prescription

Realizing an ambitious multilateral trade round and addressing the capacity priorities in poor countries requires that more be done (UN Millennium Project 2005). To secure a successful multilateral trade agreement, all partners must be able to benefit. Poorer countries will need support if they are to overcome their fears, cope with adjustment, and take full advantage of the opportunities of open trade (Lankes 2005). For more than 40 years the United States has had a Trade Adjustment Act to complement major trade negotiations. The most recent version, adopted in 2002 together with the Trade Promotion Authority, "earmarked millions of dollars to spend on retraining, education, health insurance and pension benefits." If the most competitive economy in the world considers support an indispensable tool of trade liberalization, it makes sense for the international community to envisage a similar multilateral aid program for the countries that lack the resources internally" (Ricupero 2005).

The Doha Declaration confirmed that "technical co-operation and capacity building are core elements of the development dimension of the multilateral trading system" and recognized that "sustainable financed technical assistance and capacity building programs have important roles to play" (Doha Mandate, paras. 2 and 38).⁶ Arguably, by recognizing the need to address the implementation and supply-side needs of developing countries, the declaration advanced the development dimension of the multilateral trading system (see chapter 7 by Faizel Ismail, above).

The large differences among WTO members in terms of capacity constraints and national trade policy and investment priorities affect countries' ability and willingness to incur the costs associated with implementation of WTO rules, as well as the net benefits of doing so (Hoekman 2002). To balance these tensions, WTO agreements include a gamut of special and differential treatment (SDT) provisions to try to address developing country concerns. SDT broadly includes preferential access to industrial country markets, longer implementation periods and limited reciprocity "consistent with development needs" of WTO agreements, and best-endeavor commitments to assistance.

Both developed and developing countries believe that existing SDT provisions have not been beneficial. Utilization of preferences has been relatively low, largely as a result of exemptions, restrictive rules of origin, and limited supply capacity. Broad opt-outs and exceptions for developing countries are controversial, and meaningful assistance to support adjustment and integration has not been forthcoming.

Developing countries put forward 88 proposals to improve the operational effectiveness of SDT during 2002–03. More than half of these relate to adjustment costs, capacity building needs, the impact of preference erosion, the concerns of net food importers, and policy coherence. Proposals by low-income countries are driven by a perception that a multilateral agreement (jurisdictional obligation) to liberalize trade simultaneously requires both policy flexibility (see Hoekman 2005) and a credible commitment to provide resources to address adjustment concerns and enhance supply capacity. Providing such additional resources within the context of a country's development strategy would offer the greatest potential to promote economic convergence and reduce poverty.

An expanded allocation of aid to support trade integration can also help gradually eliminate the current system of highly discriminatory trade preferences and strengthen a policy bias toward MFN liberalization and away from preferential trade agreements (Hoekman and Prowse 2005). Preferences are inefficient mechanisms for transferring resources to poor countries, because the cost to consumers and taxpayers in OECD nations is a multiple of any transfer realized and benefits are reduced by rules of origin and the exercise of market power by retailers and importers.

Preferences also create perverse incentives to resist the global, MFN-based reforms that are critical for non- or less-preferred developing countries. The price of defending preferences is continued protection in rich countries. A distorted global trading system compromises development assistance elsewhere. For example, liberalization of agricultural import tariffs and abolition of export subsidies by the European Union is estimated to yield annual gains of \$2 billion in Argentina, an increase that would increase living standards there by 1 percent (Hoekman and Martin 1999). This represents a high percentage (about 30 percent) of Argentina's

present net external interest payments. In terms of impact on poverty, both national and foreign trade reforms could significantly reduce poverty in Argentina, but foreign reforms are more important (Porto 2004). MFN liberalization plus appropriate support for adjustment and integration is a thus better path for the world as a whole. Aid (rather than preferences) is a more efficient instrument to provide assistance.

8.3 Options for Additional Support

Support for trade reform and integration benefits not only recipient countries but also the global economy as a whole. There is a very strong case for increased assistance to cover the various needs in trade support, from technical assistance to budget support or project-based investment lending. Such resources should be genuinely additional to existing aid budgets (World Bank and IMF 2005). Diverting resources from other priority areas may make little sense. In addition to the economic case for additional aid for trade, from the political economy standpoint additional assistance may be necessary to secure a successful trade round.

How might the additional support be mobilized? Any assistance will be dwarfed by the huge gains from further global trade reform. The distribution of these gains is multifaceted. Gains accrue to consumers and producers, improve corporate performance, and generate higher tax revenues to governments as a result of higher economic growth. The sizable gains offer the opportunity for donor countries to provide additional assistance to help meet adjustment and integration needs in developing countries.⁷ Some options, considered below, include the following:

- Direct additional contributions
- Leveraging of future aid commitments
- Public-private sector partnership or involvement
- Imposition of an asymmetric low temporary trade tariff on products scheduled for liberalization
- Capture of an increment of the consumer gain through a temporary levy on specific products
- Reallocation of subsidies and income support for development assistance
- Improvement of aid delivery (getting more from existing resources)

The simplest and arguably best approach to ensuring that more aid flows to where it is needed would be for donor countries to increase their aid budgets. Increasing popular support for aid would be the most effective way forward. However, many countries may find it fiscally and politically difficult to increase aid budgets. Consequently, alternative mechanisms are worth pursuing, particularly in

the context of trade liberalization, where the expected gains are large and accrue to different stakeholders. No attempt is made here to favor one option over any other (including proposals on international taxation, which are not covered).⁸ What is important is recognition of the need for additional resources for trade adjustment and integration and the potential global benefits arising from further multilateral liberalization. These options are examples of ways in which countries could link the aid and trade agendas by committing additional assistance on the basis of expected trade reform–related net gains.

8.3.1 Attracting More Direct Contributions

Recent research shows that larger and more effective aid flows are critical in accelerating implementation of the international development agenda (Commission for Africa 2005). Substantial improvements in developing country policy have improved the ability of developing countries to absorb aid. New criteria for disbursement, if pursued within the framework of better harmonization through donor and agency alignment, should yield better results (World Bank and IMF 2004).

At Monterrey donors agreed to make concrete efforts toward reaching official development assistance (ODA) levels of 0.7 percent of gross national income (GNI). Since Monterrey ODA has indeed increased, returning to the levels of the early 1990s. However, care needs to be taken in interpreting aid figures. Very large exchange rate changes and reduced inflation in donor countries account for almost 60 percent of the increase in the dollar-denominated value of aid. In addition, in 2002 more than half of the increase was due to debt relief to just two countries (Afghanistan and Pakistan), and strategic factors continued to play an important role in 2003–04, when reconstruction aid to Iraq accounted for an estimated 87 percent of the increase. Even allowing for these increases, ODA as a percentage of GNI was still just 0.25 percent in 2003, and the increment flowing to low-income countries was very small.

As the previous section details, even under the most conservative estimates the gains from further trade liberalization are enormous. Moreover, developed countries would gain in absolute terms economically even more than developing countries from trade reform, giving them the resources to engage in additional development assistance.

8.3.2 Leveraging Future Aid Commitments: The International Finance Facility

The International Finance Facility (IFF) is the most advanced proposal to front-load aid. Under the proposal put forth by the British government, donor countries

would make pledges to future payments to the facility. On the basis of the pledges the IFF would issue AAA-rated bonds in the international capital markets, with the resources raised used to support development financing. One of the strengths of the IFF proposal is that it provides the flexibility to mediate between what is needed in terms of disbursements and when donors pay for it, so that it can be adapted to support a desired ODA profile.

The effectiveness of the IFF depends on two issues. The first is how the funds are used and how much capacity developing countries have to absorb them. The second is what happens as government aid flows are diverted to repay IFF bonds. IFF flows therefore must be managed carefully to ensure that they contribute to sustainable results that will achieve the desired growth agenda on which the medium-term viability of developing country programs is based.⁹

Applying an IFF-type mechanism to trade development could potentially have a number of advantages in meeting concerns about the efficacy of such a facility. The medium-term viability (that is, sustainability) of programs supported by international financial institutions is inevitably predicated on achieving significant improvements in export performance and growth. Promoting trade and investment performance within a country's development strategy should more directly improve the future capacity of the country to repay. With sustainability considerably enhanced, the use of future aid flows for IFF bond repayments becomes less problematical. From the donor perspective, pledges to future ODA commitments are made easier if linked to a successful multilateral trade round, as gains in economic growth following implementation of the trade round comes into force will make it easier to meet commitments.

8.3.3 Involving the Private Sector

The private sector can alleviate poverty by contributing to economic growth, creating jobs, and raising poor people's incomes. Savings, investment, and innovation that lead to development are undertaken largely by private individuals, corporations, and communities. That said, the primary responsibility for achieving growth and equitable development lies with developing countries: the state of governance, macroeconomic and microeconomic policies, public finances, the financial system, and other basic elements of a country's investment climate, all of which are determined largely by the actions of domestic policy makers. The challenge is to capitalize on advances in macroeconomic stability and democracy, which will help unleash and foster the private sector. The Commission on the Private Sector and Development (UNDP 2004) emphasized the importance of a "development coalition" in which all actors—government, public development agencies, and the private sector—play mutually supportive roles. It stressed

the role the private sector, particularly large local companies and multinational corporations, can play in contributing to accelerated economic development and poverty alleviation, noting that the private sector has great potential to contribute to development through its knowledge, expertise, resources, and relationships.

The benefits of further trade liberalization to the global corporate sector are immense. Trade reform increases competition from abroad, induces changes in the mix of capital and labor, and causes local firms to adopt new technologies that raise productivity. According to recent research such “sorting and sifting” is estimated to yield an annual increase of 5.8 percent of GDP in the United States (Bergsten 2005).

Recognizing the significant contribution that further trade liberalization can make to corporate performance, both the European Commission and the United States have recently invited businesses and other partners to discuss how corporate social responsibility can be integrated into international trade, including by funding trade-related capacity building and technical assistance to developing countries. The European Commission’s communication on corporate social responsibility, “A Business Contribution to Sustainable Development,” devotes a chapter to trade and development policy and calls for corporate social responsibility to be integrated into policymaking to include the provision of capacity building and trade-related technical assistance⁴ (“Integrating CSR” 2003).

The Office of the U.S. Trade Representative has sought to increase support by corporate sponsors and private foundations for trade capacity building efforts. In support of the Central American Free Trade Agreement (CAFTA), the United States and the Central American countries have attracted additional resource partners, including nongovernmental organizations (NGOs), corporate sponsors, and private foundations that volunteer to conduct trade capacity building efforts in support of CAFTA, working in partnership with the multilateral agencies and regional development banks (Office of the U.S. Trade Representative 2003).

Successful engagement of public-private partnerships requires an effective modus operandi and mechanisms (UNDP 2004). It requires detailed policy and capacity building assessments with prioritized action matrices to which the private sector can respond and engage with donor agencies and developing country partners. The United States and several other donors are leading an effort to engage the private sector in follow-up to the action matrices arising from the trade diagnostic work under the auspices of the Integrated Framework (see below). The intention is to supplement available resources and help implement the prioritized action matrices arising from the trade policy diagnostic work.¹⁰

8.3.4 *Imposing an Asymmetric Trade Levy*

Consideration could be given to a partial transfer of import duties levied on products that are liberalized. This option does not imply direct earmarking of revenues but is a way of committing additional aid on the basis of expected trade reform–related net gains (that is, the greater the commitment to cut tariffs on a MFN basis, the greater the resources available for adjustment). Total OECD imports in 2003 were \$4.8 trillion, 73 percent of which was from other OECD members. A 0.25 percent levy on this intra-OECD trade would generate \$8.6 billion. However, much of this trade is zero duty, and it is not desirable to raise tariffs. Thus any such implicit levy should be restricted to currently dutiable imports, that is, on which tariffs are subject to reduction commitments under a new Doha Round agreement (figure 8.1). According to International Monetary Fund (IMF) data, the estimated annual duty collected by 17 OECD countries was about \$30 billion, in 1999–2001 prices (table 8.4). A very high proportion of the duty comes from imports from developing countries, particularly low-income countries. For example, in the United States, duties collected on imports from developing countries represent more than 50 percent of the total.

Trade liberalization under a Doha trade round should be able to achieve a 40 percent reduction in tariffs on goods, possibly considerably more. OECD import duty revenue would decline over the implementation period agreed to by the round. A notional increment of the affected duty collected could be set aside for adjustment assistance. For example, if negotiated tariff lines are scheduled to decline by 10 percentage points over a 10-year period, every year 10 to 20 percent of the revenue collected on these tariff lines could be set aside for a fund—that is,

Figure 8.1 Transferring Part of Current Tariff Revenue

Source: Author's calculations.

TABLE 8.4 Total Import Duties for Selected OECD Countries
(\$ millions)

Country	Latest year for which data available	Import duties	Value of imports
Australia	1998	2,289	60,774
Canada	2001	1,937	221,554
Czech Republic	2001	263	36,477
Greece	1998	17	30,267
Hungary	2001	437	33,682
Iceland	1998	31	2,483
Italy	1998	352	215,590
Mexico	2000	3,476	174,412
New Zealand	2001	264	13,307
Norway	1999	309	34,173
Poland	2001	992	50,245
Portugal	1998	2	37,048
Slovak Republic	2001	79	14,770
Sweden	1999	40	63,989
Switzerland	2000	620	83,584
Turkey	2001	423	41,399
United States	2001	19,460	1,180,074
Total		30,991	2,293,828

Source: IMF 2002.

industrial countries' fiscal revenues would have to adjust sooner to MFN liberalization in order to provide resources for developing country reform. Import duties represent a very low component of total fiscal revenues in industrial countries, and one would expect tax revenues to rise as a result of higher economic growth arising from a successful trade round. Funds would be forthcoming only on negotiated tariff lines, hence the greater the commitment to cut tariffs on an MFN basis, the greater the resources available for adjustment. The total revenue available would automatically decline over time as implementation of liberalization takes place. This would be appropriate and consistent with the aim and motivation of support, which is to facilitate adjustment and integration. These measures would be temporary and tied to the implementation period agreed upon.

The forthcoming reform in the EU banana markets offers a specific opportunity to pursue this approach. The proposed tariff, to be implemented in 2006, would generate additional revenue for the EU budget. The concept of a "self-financing" tariff has been advocated as a means to help countries affected by the

banana reform (Tangermann and Verissimo 1999). The idea has been criticized on the grounds that the level of tariff and therefore revenue is far above that necessary to "compensate" the countries affected by the change in the banana regime (Gillson, Hewitt, and Page 2005). Obviously, the tariff could be set lower if "compensation" were the desirable objective. Logically, however, the additional resources could be used for trade-related assistance in the broader context.

8.3.5 *Capturing Additional Resources Arising from Consumer Gains*

Consumer gains from multilateral trade liberalization are likely to be considerable, particularly on certain agricultural products, textiles and clothing, certain services, and industrial products. Table 8.5 summarizes the overall impact on real prices resulting from the removal of tariffs, export subsidies, input and output subsidies, and direct payments to land and capital in agriculture and the phase-out of quotas on textiles and apparel. The reforms are assumed to be phased in over six years (2005–10) (van der Mensbrugghe 2004).

Capturing some of the consumer gain from reform is probably best done by imposing a levy on selected products on which price reductions are likely to be very large rather than through a broad-based consumption tax. Consumption levies to meet adjustment needs have been used in the past, most notably by Australia. In reforming the domestic dairy market, an adjustment fund was established for Australian farmers and resourced by an \$A 0.11 per liter levy at the retail level on all drinking milk products over an eight-year period (Dairy Australia 2005). The reform provided Australian consumers with access to the world's cheapest milk. Even after the levy, real milk prices have remained below those that prevailed before reform. (The levy is expected to end in 2008–09, by which time it is expected to have raised \$A1.75 billion). The Australian Sugar Industry Reform Programme, begun in 2003, is being funded by a levy on domestic sugar sales, including imported sugar. Sugar for retail sale, food services, and manufacturing are included. The levy is collected at the point of first sale or transfer from the refinery following the refining process. There is a levy rebate for sugar used in exported manufactured products. Exports of sugar are exempt from the levy.

Given the health risks associated with high sugar consumption, capturing an increment of the price reduction on sugar could serve more than one purpose. The proposed EU sugar reform should bring about significant price reductions. The Commission of the European Communities estimates that the institutional sugar price will decline from the €632 per ton benchmark prevailing in 2004 to €385 per ton in 2009/10 (CEC 2005). Even with this reform, at current world prices EU prices would be almost twice the world price. Nevertheless, the EU sugar reform

Table 8.5 Change in Real Consumer Prices from Full Liberalization of Trade in Goods
(change in 2015 relative to baseline scenario)

Country or region	Agriculture and food	Textiles and wearing apparel	Industrial goods (excluding processed foods) ^a	Nontradables	Total
Australia, Canada, and New Zealand	0.1	-1.3	-0.4	0.0	0.0
European Union with European Free Trade Association	0.0	-1.0	-0.3	-0.1	-0.2
United States	0.3	-1.1	-0.3	-0.1	-0.1
Japan	-0.2	-0.5	0.0	0.3	0.2
Korea, Rep. of and Taiwan (China)	-1.4	-0.5	-0.2	0.6	0.1
Hong Kong (China) and Singapore	0.4	0.0	0.0	0.3	0.2
Brazil	0.5	-0.2	-0.4	0.2	0.1
China	0.0	-0.3	-0.3	0.3	0.0
India	-0.2	-0.7	-1.2	-0.5	-0.5
Indonesia	0.5	-0.2	-0.1	0.4	0.3
Vietnam	-0.4	-3.0	-2.0	0.7	0.0
Russian Fed.	-0.3	-1.8	-0.8	-0.1	-0.4
Mexico	0.1	-0.6	-0.5	-0.2	-0.2
South African Customs Union	-0.2	-1.5	-0.6	-0.1	-0.2
Rest of South Asia	-0.3	-0.9	-1.0	-0.4	-0.5
Rest of East Asia	-0.2	-0.6	-0.6	0.4	0.0
Rest of Latin America and the Caribbean	0.0	-0.8	-0.7	-0.1	-0.2
EU accession countries	0.0	-0.7	-0.4	0.0	-0.1
Rest of Europe and Central Asia	-0.1	-0.6	-0.3	-0.1	-0.2
Middle East	-0.3	-1.0	-0.7	0.0	-0.2
North Africa	-0.2	-4.6	-2.6	-0.3	-0.7
Rest of Sub-Saharan Africa	-0.5	-2.1	-1.4	-0.3	-0.6
Rest of the world	-0.2	-0.3	-0.4	-0.1	-0.2

Source: van der Mensbrugghe 2004.

Note: a. Includes textiles and apparel.

TABLE 8.6 Price Premiums in the EU Agricultural Sector

Item	Beef	Milk	Cheese	Bananas	Sugar
EU (\$/metric ton)	4,761	3,034	5,170	569	466
World (\$/metric ton)	2,300	2,159	3,764	347	274
EU price premium as percentage of world price	107	41	37	64	70

Source: UNCTAD Agricultural Trade Policy Simulation Module database.

represents a cumulative reduction in sugar beet prices of 37 percent. The EU sugar regime is financed primarily by EU consumers (who pay higher than world prices) and levies on EU sugar production (paid to the EU budget). The expected reduction in consumer prices offers the opportunity to consider a levy. Research on the most effective level would need to take into consideration the overall impact on sugar demand and the possible impact on producer prices. However, carefully calibrated, it should be possible to ensure that the real price of sugar to consumers does not increase. Other price premiums in the EU agricultural sector can be seen in table 8.6. As a percentage of world prices, EU price premia, range from 41 percent on milk to 64 percent on bananas and 107 percent on beef.

Capturing an increment of the consumer gain could also be promoted voluntarily. For example, the end of the Multifiber Arrangement and possible further reductions in tariffs on textiles, clothing, and shoes will almost certainly see the "landed cost" of these items decline substantially, depending on how proactive retailers are in restructuring their supply chains. A voluntary contribution/donation by clothing retail corporations, consumers, or both (representing a small increment of the price reduction) could be promoted for a temporary period. For example, a contribution of \$0.50 per \$10 reduction in the price of jeans could be split equally between consumers and retail corporations to promote aid for trade in low-income countries. This would simultaneously raise consumer awareness of the huge benefits that multilateral trade brings through cheaper and varied products and increase the desire to help the poorest countries integrate into and benefit from the global trading system.

8.3.6 Reallocating Budgets

The elimination of export subsidies and trade-distorting domestic support mechanisms should provide for budgetary savings, at least in the medium to longer term. Reallocation of support from subsidies and trade-distorting domestic support to internal compensation mechanisms and increased development assistance to meet adjustment needs should be possible and needs to be researched. In the

short to medium term, however, it may be difficult to raise additional resources for development assistance. For example, the EU budget is determined and fixed over a two-year period. Meaningful reform, particularly to the Common Agricultural Policy, which will benefit developing countries enormously, may well require additional resources.

8.3.7 *Increasing Aid Effectiveness*

There is increased recognition that improving aid effectiveness requires aligning assistance around country strategies and priorities, as well as harmonizing donor policies, procedures, and practices around strengthened partner country systems. Despite progress, much remains to be done. Multilateral and bilateral assistance is provided from different sources, and beneficiaries are often burdened by multiple donor-specific priorities. Promoting trade development is no exception. There remains a multiplicity of trade-related assistance initiatives by both bilateral and multilateral agencies.

Assistance needs to be delivered within a coherent policy framework, within which a broad trade and investment agenda prioritizes areas of action in terms of both policy and support. Recently, multilateral and bilateral donors have tried to improve coherence and coordination and provide for a more systematic and effective delivery. Recent important initiatives include the Integrated Framework for Trade-Related Technical Assistance and the Trade-Integration Mechanism (TIM), an IMF facility. Bilateral efforts include the U.S. Millennium Challenge Account Corporation, through which additional resources are made available within the context of a country's overall policy and governance framework. The European Commission has also revised procedures for trade-related funding to ensure that it is more supportive of country's overall development objectives. These efforts are briefly reviewed below.

Integrated Framework for Trade-Related Technical Assistance (IF). The Integrated Framework brings together the key multilateral agencies working on trade development issues, namely, the IMF, the International Trade Centre (ITC), UNCTAD, United Nations Development Programme (UNDP), the WTO, and the World Bank. The basic purpose is to embed a trade agenda into a country's overall development strategy (usually the PRSP) and ensure that trade-related adjustment and capacity building assistance is consistent with the broad trade policy aims of the country concerned and prioritized with other development assistance needs.

To a large extent the philosophy behind the Integrated Framework mirrors the intentions of what is now known as the "new aid framework" to improve harmonization among providers of trade assistance (both bilateral and multilateral) and place trade within the context of a country's overall development strategy—that

Figure 8.2 Current Status of Integrated Framework

Source: Author.

is, improving international policy coherence. The majority of LDCs (more than 40) have now applied for assistance under the scheme. As of 2005 there were 17 bilateral donors (including Canada, the European Union, Japan, and the United States). A small trust fund finances the national trade assessments (diagnostics) and provides for small-scale technical assistance arising from the action matrices identified in the assessments. The larger identified and prioritized trade capacity-building needs are presented within the context of the consultative group meetings and roundtables associated with the PRSP process, to which both bilateral and multilateral donors can respond.

Figure 8.2 provides a schematic diagram of how the Integrated Framework operates in practice.¹¹ The trade and investment assessment is undertaken by the country, usually in partnership with the IMF, the World Bank, and the UNDP.¹² It looks at a range of issues, including the linkage between trade reform and poverty, the need for additional fiscal measures, likely social adjustment costs, and other necessary complementary behind-the-border policy reforms. It also identifies a prioritized list of trade-related capacity building needs, many of which relate to trade-related infrastructure, trade facilitation, standards, and social costs. This list takes the form of an action matrix of prioritized trade-related capacity-building and assistance needs that are linked to the country's overall development strategy. The list allows both bilateral and multilateral donors to respond to each country's identified needs in a systematic and coherent manner, based on comparative advantage and preference.

In most cases the PRSP and the prioritized trade capacity-building plans are presented at the consultative group meetings and roundtables associated with the PRSP process, where donors usually make pledges. Bilateral donors can continue to

contribute bilaterally or provide resources through multilateral organizations. Either way, the process reduces the duplication and proliferation of vertical initiatives and ensures that assistance is provided according to the needs identified by the country. However, in an aid resource-constrained environment, prioritized trade action plans have had to compete with other priority sectors such as, health and education. As a result, implementation of the trade action plans has been limited.

Trade Integration Mechanism. The IMF recently set up the Trade Integration Mechanism to help countries expecting short-term balance of payments difficulties cope with the effects of multilateral liberalization (IMF 2004). The TIM is intended to address not only preference erosion but also instances such as balance of payments shortfalls as a result of the abolition of quotas on textile exports under the WTO Agreement on Textiles and Clothing and the possible impact on net food-importing developing countries of higher foods import prices. The TIM operates through existing IMF facilities. Its virtue is that the impact of possible adjustment—resulting from preference erosion, for example—is considered and placed in the context of a country's overall macroeconomic framework through IMF-supported programs. A coherent policy framework is provided to enable the country to benefit from the improved resource allocation that multilateral liberalization offers. The usual IMF policy conditionality and terms and costs of lending apply. Therefore the impact of assistance on a country's external debt burden needs to be taken into account.

The Millennium Challenge Account. The Millennium Challenge Account is a U.S. facility designed to assist developing countries within the framework of their own development program in achieving sustainable economic growth and poverty reduction. Eligibility is determined by a range of indicators that assess governance and economic management. Once a country is determined to be eligible for assistance, it is up to the country to submit projects in accordance with its own development priorities. Projects can be in any sector.

Established in 2003, the Millennium Challenge Account program is still very much in its infancy. However, early indications suggest that eligible developing countries are drawing on the prioritized trade and growth diagnostic assessments associated with the Integrated Framework to develop projects. Madagascar, for example, is to receive funding to support a range of agricultural business investment activities identified in the Diagnostic Trade Integration Study (DTIS). Other eligible countries are currently designing projects, drawing on the prioritized assessments conducted as part of the DTIS and PRSP processes.¹³

African, Caribbean, and Pacific (ACP)–EC Partnership Agreement and the European Development Fund. In the past the European Union has made financial transfers to developing countries to compensate for declining and volatile export earnings.

A number of problems, largely associated with the nature of stand-alone assistance, have undermined the effectiveness of this support.¹⁴ Under the Cotonou Agreement, a new instrument—FLEX—was established to provide additional financial support to mitigate the adverse developmental effects of unstable export earnings. Revisions were made in 2004.

The FLEX instrument provides general budget support rather than sector-specific allocations. Where possible, funds made available through FLEX are channeled into direct budget support within the framework of an agreed PRSP. These funds thus complement ongoing macroeconomic programs.

Eligibility is determined by changes in overall export earnings and the impact on the budget, with support provided to countries that have registered a 10 percent loss in export earnings (2 percent in the case of LDCs) and a 10 percent worsening of the public deficit. FLEX operates within the context of lending under the European Development Fund, which itself has been subject to major operational revisions.¹⁵

8.4 Operational Structure of an Aid for Trade Mechanism

The foregoing reveals that steps, including better coordination among key donors and international organizations in the provision of assistance, have been taken to improve international policy coherence. Despite efforts to improve policy coherence and coordination, however, commitments to trade-related assistance and capacity building remain low.

BOX 8.1

Proposals for Stand-Alone Trade Facilities

The need for assistance and the political motivation to address adjustment costs to promote further multilateral trade liberalization (notably with respect to preference erosion) has given rise to calls for new facilities. Two are reviewed below.

In 2004 the Commonwealth Secretariat (2004) proposed creating a Special Fund for Diversification (SFfD) to mitigate the impact of the erosion of preferences due to MFN liberalization. Proposed financing (from "pooled donor funds") would be provided "commensurate with preference losses" for private sector-led export diversification investments. A share of SFfD funds would be set aside for a private sector window to facilitate investment in starting or expanding small and medium-size businesses or restructuring or rehabilitating businesses in nontraditional sectors. Remaining funds

(Box continues on the next page.)

BOX 8.1 (*continued*)

would be provided for a public sector window for infrastructure investments and two optional technical assistance and social safety net windows.

The losses in income transfers for sugar, beef, bananas, textiles, and clothing producers in trade preference-dependent economies are estimated to be \$1.72 billion a year. Producers are estimated to require 14–20 years to adjust, yielding an estimated net present value financing of \$6.0–\$13.8 billion. No account appears to have been taken to assess the likely offsetting positive benefits of MFN liberalization.

Page and Kleen (2004) argue that securing a successful WTO agreement remains the overriding consideration—that is, there is a global public good case for a fund to meet the costs of compensation. Given the potential global efficiency and welfare gains, beneficiary countries might be expected to contribute to a fund. Since it would be incorrect to consider this fund as aid, Page and Kleen argue it should be housed at the WTO. How donor countries would provide resources would be a matter of choice, although the level of contributions would be determined by various criteria (share of trade, income, “guilt” in preferences). Seen as compensation for a previous benefit, funding should be allocated without conditions and allocated to beneficiary countries according to the estimation of loss of preferences. The fund would need to be secure. Voluntary commitments would need to be made legally irrevocable.

The proposed fund would be a major departure from current practices in many respects. First, the WTO is neither a development nor a financial agency—nor should it be. Placing a funding mechanism for trade adjustment associated with preference erosion in the WTO would change the role of the organization. In practice, assistance would be considered official development assistance (ODA) and would therefore be expected to come from current aid budgets and be administered by development agencies.

To a very large extent, the two options go against the emerging wisdom on improving aid effectiveness and enhancing international policy coherence. Leaving estimation concerns aside, establishing a new fund to address issues arising from preference erosion is problematic. There is no doubt that the adjustment costs arising from preference erosion must be addressed, but establishing a separate fund targeted at one specific structural adjustment need and set of countries runs counter to a more harmonized approach to development assistance. Adjustment to MFN liberalization will also affect many countries that have not benefited from preferences. They too will require assistance to adjust. The need to diversify is not unique to economies that have benefited from preferences but is common to numerous countries, notably those facing a narrow export base.

Historically, schemes aimed at promoting export diversification have done no more than entrench already inefficient industrial and production patterns. Funding has to be provided within the context of the overall country development program and a broad macroeconomic policy framework to realize the dynamic gains associated with MFN liberalization. As a

development tool, such mechanisms are therefore likely to be largely ineffective and are unlikely to find widespread support from donors or recipient countries. Moreover, these options could be counterproductive. "Compensation" facilities without clearly defined additional resources and an enabling development mechanism could justifiably be viewed skeptically by developing countries as a payoff for signing new trade agreements.

This section briefly sets out some guiding criteria for providing additional support for trade. The proposal is not to create a new stand-alone facility. Rather, the aim is to build on the basic principles of the Integrated Framework and to establish a broad-based trade and investment agenda within the context of a country's development strategy with identified and prioritized policy and trade-related capacity building needs to which partner countries and donors can respond.¹⁶

8.4.1 Guiding Criteria

Meeting the international development agenda requires action on several fronts. More aid is one element for success; reforming international trade, supporting policy reforms in developing countries, and improving the way aid is delivered are also essential. Developing countries need to pursue a range of reforms that will enhance the environment for private investment (both foreign and domestic). These include improving the infrastructure, the management of public resources, the effectiveness of service delivery, and governance. Aid management and implementation practices need to continue to shift toward stronger alignment with country policies and programs, increased harmonization (of bilateral and multilateral efforts), and greater focus on results (World Bank and IMF 2004).¹⁷ Increased aid will be effective only if there is adequate absorptive capacity, which may need to be developed simultaneously with larger aid flows. Increasing the flow of aid needs to take account of the likely impact on the exchange rate and overall competitiveness. To do so, a country-specific strategy is required. But raising absorptive capacity is not an excuse for delaying aid mobilization

Two issues are particularly pertinent in considering the operational structure needed to provide increased support for trade adjustment and integration. First, no one agency can respond to all the needs for trade adjustment and integration. A system thus needs to be designed that harmonizes existing processes around a country's development plans. That said, any system needs to take account of existing donor practices, recognizing that progress toward increased harmonization around country programs inevitably will be incremental.¹⁸ Second, ensuring greater coherence between the system of trade rules (that is, the WTO rules-based system as a global public good) and the development needs of countries, which

are supported largely by the international financial institutions and other development agencies.¹⁹

Increased coherence does not imply duplication; the WTO should not become a development agency. In line with the recommendations on the provision of global public goods (G-7 2001), the roles of the WTO, international financial institutions, and the multilateral development banks need to correspond to each institution's core competencies, comparative advantage, and capacity. The provision of trade-related support is no exception. Each multilateral development bank's activity in these fields should be grounded in its core business and country work. The international financial institutions and multilateral development banks should work in close collaboration with other UN agencies (including the WTO) and bilateral donors, exploiting synergies and effective partnerships.

8.4.2 *Building on the Basic Principles of the Integrated Framework*

The Integrated Framework has become an established and well-regarded mechanism for mainstreaming trade into a country's development program and providing a programmatic approach to assistance for adjustment and integration (Capra International 2003). A consortium of development partners, the Integrated Framework links the international financial institutions with the UN system (trade development) and the WTO (trade rules). Its basic principles promote the new aid framework, which calls for greater donor harmonization and additional aid to be provided in the context of a country's overall development strategy. The Integrated Framework is also working to bring in other key stakeholders, notably the private sector.

To date the Integrated Framework has been largely an unfunded mandate relying on the consultative group and roundtable pledging sessions to implement adjustment needs and capacity building. Moreover, consideration of trade and investment activities within the PRSPs has had to compete with other sectors and has been relatively limited. While the value of embedding trade policy within the context of the PRSP is understood, without additional assistance developing countries will rightly question the efficacy of the program in helping them integrate into the global trading system. What is needed is increased support in order to prepare, articulate, and identify a coherent trade, investment, and growth strategy in country, within the context of a country's development process (the PRSP), and additional resources to address the identified trade adjustment costs and capacity-building needs.

Many countries lack the resources to design and implement effective trade and investment policies (McLeod 2004). Additional support to build sustainable capacity would help countries implement multiyear programs of policy reform, trade-related activities, and investment, including private sector investment in the context of the PRSP. A strengthened Integrated Framework within the context of the PRSP would provide a clear framework on adjustment costs, trade facilitation needs, trade-related infrastructure investment, and institutional reform programs that would help eliminate bottlenecks and expand trade.

This framework would provide a basis for subsequent new investments and programs, which could be undertaken with support from existing institutions, using existing instruments coordinated under the auspices of the PRSP. Increased resources would be made available at the time of the consultative group and roundtable process. Countries could decide whether to use resources for specific projects identified within the prioritized list of trade capacity-building needs or for direct budget support in case of loss of fiscal revenue and social adjustment costs. Increased support and disbursement would be considered in the context of a country's macroeconomic and development strategy. Issues relating to the absorptive capacity and likely impact of larger aid flows on the exchange rate and competitiveness would therefore be taken into account.

Consideration should be given to extending the Integrated Framework program beyond the 49 (UN-defined) LDCs to include other low-income countries that are likely to incur adjustment costs and will need to undertake significant trade-related investment to benefit from improvements in market access. The program could, for example, be extended to all International Development Assistance or poverty reduction strategy countries. This would facilitate a more regional approach to assistance in cases in which supply-side constraints could usefully be addressed at a multicountry level (World Bank and IMF 2004). Extending assistance to a wider group of countries should be manageable, as it has been in other contexts, such as the Global Environmental Facility (box 8.2).²⁰

Building on the basic principles of the Integrated Framework does not imply that the current organizational structure should be retained. Improving the linkages to the PRSP process would inevitably require strengthening of institutional arrangements. This would include bolstering in-country institutional capacity (often but not exclusively through the trade, planning, and finance ministries); promoting stronger linkages between trade, investment, and growth within the PRSP, better managing the trust fund; and increasing the capacity of the functionally independent Integrated Framework Secretariat. Figures 8.3 and 8.4 provide a suggested operational structure.

Figure 8.3 Aid for Trade: A Possible Model

Source: Author's calculations.

8.5 Concluding Remarks

International integration provides scope for enormous and sustainable gains in growth and poverty reduction. Trade reform needs to be set in the broader context of a country's development strategy to allow a gradual opening to imports and foreign investment as the complementary behind-the-border institutional and social structures are put in place. Providing additional support to developing countries to improve productive and growth agendas within their development strategies makes enormous sense. A successful Doha Round would represent a powerful global public good that would yield significant aggregate gains to the world economy. Seen in this context, increasing support to facilitate trade, sustainable growth, and economic convergence of the poorest countries is a highly desirable win-win policy prescription.

Figure 8.4 Increased Aid for Trade

Source: Author.

BOX 8.2

A Comparison between the Integrated Framework and the Global Environment Facility

At the 1989 Annual Meetings of the IMF and World Bank, the French Prime Minister Michel Rocard suggested establishing a fund of voluntary grants devoted to the global environment. The Global Environment Facility (GEF) was established through a pilot phase that appears to have been crucial in getting the GEF off the ground (Boisson de Chazournes 2003). The pilot phase allowed donor governments and the international system to gain experience in operation without having to agree on the formalities and technicalities of the facility.

The three implementing agencies involved with the fund are the World Bank, the UN Environment Programme, and UNDP. They were expected to collaborate in accordance with their respective core competencies. The cooperation between the agencies brought practical and political advantages. Some countries favored a strong role for the UN agencies, while others wanted the World Bank to play the leading role.

The governance structure of the GEF has evolved over time. Initially, an implementation committee reviewed the work program proposed by the implementing agencies. An external evaluation of the pilot phase (completed in 1993) concluded that the coordination arrangements among the implementing agencies, which were supposed to have created interagency synergy and provide leadership for the GEF as a whole, had proved

(Box continues on the next page.)

BOX 8.2 (*continued*)

ineffective. The problem was due to the absence of an arbiter who could have provided guidance on decisions.

The restructured GEF remains located within the World Bank, although its autonomy and independence were strengthened. A functionally independent secretariat was created, with its chief executive officer accountable to the main executive organ, the GEF Council. The council is made up of 32 members, with equal representation from developed and developing countries. The GEF's independent governance structure and the existence of its own secretariat has been considered crucial for providing overall direction of the program.

A new "programmatic approach" is currently being put forward, based on an agreement between a country and the GEF secretariat, the implementing agencies, and other donors. The intention is to move away from a fragmented approach based on projects developed independently from one another.

The Second Overall Performance Study of the GEF (2002) strongly endorsed the facility's "constructive interagency cooperation." It found that the GEF model offers a good example of "clustering" different agencies and activities. It works on creating synergies and linkages. It provides a viable blueprint for managing common interests.

To a large extent, the evolution of the Integrated Framework has followed that of the GEF. Once restructured (in 2001), the Integrated Framework was piloted in three countries before being expanded to other countries when additional resources were made available. The pilot phase was crucial. Building on the success of the pilot brought in more donors, funding, and requests for assistance from recipient countries, including non-LDCs. The cooperation of the agencies has had both practical and political advantages, with many developing countries (and civil society) keen to see the UN agencies complementing the international financial institutions on trade issues, while others supporting a strong role for the World Bank.

The GEF and Integrated Framework structures demonstrate how the UN system can adapt to face new challenges while using existing institutions. Flexibility and pragmatism were important tools for setting the policy and legal profile of these programs without a full-fledged international legal framework. This has created a new partnership between the international financial institutions and the United Nations and encouraged new ways of cooperation among these institutions and other partners, such as regional development banks.

Trust-based institutions like the GEF and Integrated Framework, which are based on a fiduciary principle, are well placed to engage the private sector involvement, as the GEF has already done (the Integrated Framework is in the preliminary stages of doing so). However, engagement of the private sector, notably in trade-related support, may give rise to potential conflicts of interest. Mechanisms such as the GEF and Integrated Framework offer appropriate means of avoiding both bias and allegations of biases, with the program working in the overall interests of beneficiaries (Boisson de Chazournes 2003).

Notes

1. More than half of the 88 special and differential treatment proposals made by developing countries to improve and make more effective the provisions for developing countries within the WTO relate to adjustment and capacity building needs, concerns over preference erosion, and issues relating to policy coherence.
2. Francois, Hoekman, and Manchin (2005) estimate that average transactions costs associated with the use of preferences represent about 4 percent of the value of goods, reducing the magnitude of erosion costs significantly. For those products for which preferences are used, the primary negative impact follows from erosion of European Union (EU) preferences.
3. The WTO designates 79 countries as net food importers.
4. Recent estimates suggest that on average, trade tax revenues accounted for about 4 percent of low- and middle-income countries' GDP between 1995 and 2000; the equivalent estimate for high-income countries was less than 1 percent. Trade taxes represent 18 percent of total revenues in the average low-income country and as much as 50 percent of revenues in the most tariff-dependent countries (Kowalski 2005).
5. The WTO and OECD secretariats have combined to create a Doha Development Agenda Trade Capacity-Building Database. According to information provided by 39 bilateral donors and multilateral agencies in 2001 and 2002, 177 developing countries received some assistance in trade policy (amounting to \$720 million), and 163 developing countries received assistance in trade development (amounting to \$1.4 billion)—some \$1.1 billion a year spread over some 170 countries. Activities were heavily concentrated. Five countries (China, Indonesia, Thailand, Uganda, and Vietnam) received funding for more than 150 activities each (WTO and OECD 2003). Africa received just 20 percent of trade policy support (some \$150 million), the bulk of which went to Uganda.
6. The WTO July 2004 General Council Decision (framework agreement) went farther, calling for "developing countries and in particular least developed countries to be provided with enhanced trade-related and technical assistance and capacity building to increase their effective participation in the negotiations, to facilitate their implementation of WTO rules and to enable them to adjust and diversify their economies. . . . And special attention shall be given to the specific trade and development related needs and concerns of developing countries, including capacity constraints."
7. Middle-income countries stand to gain considerably from a successful trade round. From a political economy standpoint, their inclusion within the donor group would be appropriate.
8. A number of proposals have been made on ways to raise additional revenue for financing global development through international tax instruments or measures to encourage voluntary giving by individuals, although none is directly linked to the benefits accruing from trade liberalization. For a comprehensive review of these proposals, see annex 1 of World Bank and IMF (2004), which surveys the issues and proposals, including the report of the working group appointed by French President Jacques Chirac (Landau 2004).
9. For additional information on the IFF, see World Bank and IMF (2004).
10. Arising from the work of the Commission for Africa, a business action group has been established that is discussing, among other issues, the role of the private sector in encouraging trade facilitation and customs reform (Commission for Africa 2005).
11. Governance of the Integrated Framework is currently undertaken by two bodies, the Integrated Framework Steering Committee (IFSC) and the Integrated Framework Working Group (IFWG), both supported by a small secretariat. The IFSC comprises representatives from the three partners in the Integrated Framework (donors, recipient countries, and agencies), with participation open to any member or representative of the three partners. It oversees the broad policy and contextual issues for the Integrated Framework. The IFWG is responsible for dealing with the executive functioning of the Integrated Framework and specific implementation issues, including day-to-day operations. To keep the functioning of the IFWG small and balanced, six agencies are represented, and donors and recipient countries have just two representatives each. Both donors and recipients have established coordinating donor and recipient groups to inform the IFWG and IFSC. The donor chairs are rotated periodically. The trust fund is currently managed by UNDP.

12. Currently, a small secretariat located at the WTO handles paper flow, and UNDP manages the trust fund.

13. For information on the Millennium Challenge Account, including criteria and methodology for the eligibility of candidate countries and country projects, see <http://www.mca.gov/>.

14. Financial support for export revenue shortfalls was provided by the ACP–EU Stablex arrangement. This arrangement covered only a set list of eligible products, and transfers had to be used to support the commodity affected. Restrictions on use and time delays left a large portion of the funds undisbursed.

15. The Ninth European Development Fund (EDF-9) provides financial commitments through at least 2007 and expenditure over a longer period. All funds remaining uncommitted from previous EDFs have been rolled into one fund, and there is now a single set of procedures for commitment of all EDF assistance. Country programs will be financed from one overall long-term development envelope rather than through separate instruments, and funding will be determined by a single EC Country Support Strategy. EDF-9 has committed €13.8 billion. In addition, €7 billion is unspent from previous EDFs. This allows the EDF to spend €3 billion a year. All 77 African, Caribbean, and Pacific countries are technically eligible.

16. Increased recognition of—and political motivation for—the need to address the adjustment costs arising from multilateral trade liberalization has led to proposals for new stand-alone facilities. Some of these are reviewed in box 8.1.

17. Whether or not aid works depends largely on the quality of both the donor and the recipient. Reviewing work by Mallaby (2005), Wood (2005) argues that too frequently donors do not pay much attention to what other donors are doing, ignore plans governments themselves have made, and overwhelm the bureaucracy with paperwork and negotiations. In 2003, for example, Tanzania produced an average of 2,400 reports a year for external donors and was visited by some 1,000 donor missions, leaving little time for the business of governing the country.

18. The Millennium Report of the Secretary-General of the UN (2000) stressed that “the need to strengthen the UN system implies avoiding the unnecessary creation of new institutions or the duplication of activities.” Instead, common objectives should be achieved through “informal policy networks that bring together international organizations, national governments, the private sector and civil society.”

19. Recently, there has been a “paradigm shift” giving “special place to common interests” by recognising that some development issues both benefit and require the obligation of the entire global community. The global trade regime as a global public good has and can further have a strong impact on development, poverty reduction, and arguably political stability (Boisson de Chazournes 2003).

20. Box 8.2 compares the evolution and operational structure of the Global Environment Facility (GEF) and the Integrated Framework. The GEF is based on a consortium approach to achieve common objectives. It may be able to offer insights into the organizational implications of strengthening the Integrated Framework and how it should be linked to the poverty reduction strategy process.

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PART III

RULES AND
ENFORCEMENT

TRADE FACILITATION AND THE WTO

Krista Lucenti

Due in part to the increase in volume and complexity of world trade, trade facilitation has become a key area for reform in the multilateral context. There is a case for all World Trade Organization (WTO) members, especially developing countries, to improve trade facilitation in order to secure the gains from earlier trade reforms and to take advantage of new and increasingly important ways of organizing production across national borders. Recognizing the merits of these arguments was one of the reasons why members of the WTO agreed in August 2004 on the modalities for multilateral negotiations on trade facilitation.¹

The objective of this chapter is to clarify the existing proposals and advocate the adoption of broader disciplines. The chapter briefly describes the key economic issues at hand and stresses that changes in global trading patterns have reinforced the momentum for reforms to improve trade facilitation at the national and international levels; highlights the significant overlap created by the involvement and programs of several intergovernmental and regional organizations that address trade facilitation matters; summarizes the country submissions to the WTO on proposals for reform of Articles V, VIII, and X of the General Agreement on Tariffs and Trade (GATT); and assesses arguments for and against further multilateral rules on trade facilitation. Given the evidence on the benefits of improving trade facilitation, ideally negotiations ought to include modalities with a wider scope and breadth than currently proposed, recognizing that broader disciplines on trade facilitation could pose a problem for some developing countries in terms of implementation costs. In addition, serious consideration must be given to engaging in General Agreement on Trade in Services (GATS) negotiations, since many of the benefits from trade facilitation reform arise out of improvements in services. The chapter makes a number of suggestions as to how

to better develop capacity in developing countries on trade facilitation–related matters.

The chapter is organized as follows. Section 9.1 discusses definitions of trade facilitation, why trade matters, and why international cooperation is needed. Section 9.2 summarizes the status of international cooperation and discusses trade facilitation, both outside and within the WTO. Section 9.3 advances the case that the WTO provides the best forum for progress on reforms in trade facilitation. Section 9.4 recommends a number of policies for improving the content and impact on developing countries of any agreement in this area.

9.1 What Is Trade Facilitation and Why Does It Matter?

In the narrow sense, trade facilitation reforms focus on reducing the costs and uncertainty of transporting goods across national borders, including reducing the documentation needed to do so. In the broad sense, improvements in trade facilitation seek to improve the commercial and policy environment in which transactions occur. Doing so involves harmonizing and simplifying customs procedures, increasing the transparency of regulations and procedures, using newer information technologies, reforming institutions and agencies that implement trade facilitation-related matters, and other measures (Wilson, Mann, and Otsuki 2003, 2004).

The scope of the definition of trade facilitation will determine, in part, which policy initiatives are identified and which government measures might be affected. Improvements may pertain to customs administration, the national payments system, rules of origin, the cost and efficiency of different modes of transportation, technical regulations, health and safety regulations, government procurement policies, competition policy, and tax collection practices. Cross-border transactions involve many processes and many actors, and the uncertainty and inefficiencies can compound significantly.

The economic benefits of trade facilitation are well documented. (Annex 1 provides a brief summary of some of the major estimates of trade transactions costs and trade facilitation benefits.) Trade liberalization at the WTO has increased market access for developing countries, presenting opportunities for exporters. Trade facilitation can contribute as well to a country's overall trade development strategy "by optimising the use of the trade infrastructure and complementing the trade promotion efforts by improving the country's image as an efficient trading center" (UNESCAP 2002). Developing countries that benefit from preferential trading agreements will profit more if they have clear and objective rules of origin. Adopting more modern manufacturing techniques (just-in-time delivery) will help

developing countries attract foreign direct investment (FDI); increasing a country's competitive ability will allow it to take advantage of market access opportunities. By expanding trade volumes, trade facilitation measures reduce the likelihood that government revenues fall after tariffs are reduced. Attaining such benefits will require some initial costs related to making structural adjustments, rearranging and retraining personnel, implementing new procedures, and automating and computerizing customs clearance and tax administration (World Bank 2002).

There are two compelling arguments for improving trade facilitation. One is that countries will not fully realize the gains from trade liberalization unless they also prioritize trade facilitation. Reductions in tariff levels—at home and abroad—will offer fewer benefits to economies whose customhouses and transportation infrastructures are ill-equipped to handle increased imports or clear exports quickly enough. A second, newer argument relates to the nature of changing production and trading patterns. Countries must improve their policies toward trade facilitation in order to take advantage of new forms of time-sensitive trade (which often includes trade in parts, components, and high-value consumer goods) to encourage FDI associated with cross-border production networks and to retain or develop the competitiveness of national firms. Countries that cannot or will not reform trade facilitation will find it more difficult to break out of their traditional trading patterns, and their exports may lose markets to rivals in better-placed jurisdictions.

Why Cooperate?

Since there are clear gains to trade facilitation, why have governments not reformed unilaterally? Unilateral efforts have occurred more often in industrial countries that are keen to improve their firms' competitiveness (and have the resources to do so). Some developing countries have also embarked on ambitious reform projects, but powerful domestic interests often frustrate unilateral reform steps. Some customs officials receive extralegal payments as a primary source of income, others may be motivated by a desire for the quiet life; both are likely to vigorously oppose reform. Corruption continues to be a major problem in some developing countries, hence improving trade facilitation has a governance angle to it. Moreover, many developing countries face shortages of trained personnel, limited financial resources, and inadequate physical infrastructure, all of which constrain their ability to reform.

The difficulty of unilaterally improving trade facilitation may reflect two distinct pressures. Just as in tariff reform, import-competing interests have a strong incentive to ensure that the cost of cross-border transactions remains high. Unlike tariff reform, however, inefficient or corrupt government officials may have a

stake in opposing improvements in trade facilitation—an important consideration given that any such reform will have to be implemented by these officials. Their opposition to reform may explain why tariff reform appears to precede reform of trade facilitation measures. Export interests may support unilateral reform of trade facilitation, but their willingness to do so is likely to be conditional on having access to foreign markets. For any of these reasons, unilateral reforms are unlikely to reach their full potential.

The question then is whether reform might be more easily accomplished in the context of an international agreement. To the extent that negotiations on trade facilitation are coupled with generalized measures to improve overseas market access, a nation's exporters are more likely to support reform initiatives. Even some exporters who are not currently facing delays at domestic ports may support improving trade facilitation at home if it is seen as the "price" to pay for concessions in other areas. All in all, pro-reform forces are strengthened by international measures on improving trade facilitation.

There is a distinct argument that entry into an international accord on trade facilitation is likely to follow reductions in tariffs. This explanation might be termed the "preservation of the existing bargain." Governments can substitute tariff barriers with nontariff barriers, such as customs delays, excessive paperwork, and overzealous customs inspections and requirements. A government that is not committed to implementing a previously agreed-on reduction in tariffs—or finds itself under (perhaps unexpected) protectionist pressure not to do so—may time investments in trade facilitation, reducing the capacity of customhouses to process additional exports. To reduce the likelihood of this happening, trading partners may insist on negotiating an international accord on trade facilitation measures.

The case for international collective action on trade facilitation is changing in line with recent developments in global trading patterns. The spread of regional and global supply chains implies that there are now firms with a keen interest in seeing parts, components, and semi-finished goods imported and exported expeditiously, predictably, and at low cost. These firms will support both unilateral and multilateral reform initiatives, especially to the extent that multilateral reforms facilitate trade abroad as well as at home. Exporters of time-sensitive goods are particularly likely to support unilateral and multilateral reform, especially if rival firms located abroad face fewer impediments to exporting.

Overall, support for unilateral reform has grown, raising the possibility that support for international collective action will follow. However, exporters will still have an interest in improved trade facilitation abroad, and the need to "preserve the original bargain" will provide strong motivation for international accords that seek to improve trade facilitation.

9.2 International Cooperation on Trade Facilitation

Discussions on trade facilitation have historically been driven by international and regional initiatives reflecting inputs from the private sector, especially chambers of commerce. Relevant international organizations include, but are not limited to, the World Customs Organization; UN agencies, such as United Nations Conference on Trade and Development (UNCTAD); and the United Nations Economic Commission for Europe (UNECE); the World Bank; the Organisation for Economic Co-operation and Development (OECD); the International Monetary Fund (IMF); the International Maritime Organization (IMO); and the International Civil Aviation Organization (ICAO). Regional arrangements that address trade facilitation include Asia-Pacific Economic Cooperation (APEC), the Free Trade Area of the Americas (FTAA), Mercosur, and the European Union (EU). Perhaps the greatest lobbying efforts have arisen from the private sector through the International Chamber of Commerce (ICC) (table 9.1).

APEC, UN agencies, and the ICC have been extremely active in advocating and seeking trade facilitation reforms. Since 1989 APEC has been one of the most active proponents of trade facilitation initiatives. Its goal is to reduce transactions costs by 5 percent within five years. In an effort to achieve this goal, APEC has spent nearly \$30 million on trade facilitation activity since 1993. These funds have been allocated to standards and conformity assessment (44 percent), customs (15 percent), e-commerce (12 percent), business mobility (8 percent), regulatory reform (4 percent), and other areas (17 percent). Although APEC has a limited budget for trade facilitation, it has offered itself as a coordinator between the WTO and other international organizations for pursuing trade facilitation goals.

UN agencies play an important role in implementing the new strategies for trade facilitation. The UNECE, UNCTAD, and the International Trade Centre (ITC) work together, but each has its own specific role. The UNECE develops trade facilitation standards and recommendations for reducing and automating procedures. The ITC develops programs and offers training in trade for developing countries. UNCTAD, through its trade efficiency programs, provides delivery mechanisms and assistance for the norms and programs developed by the UNECE and ITC, as well as technical advice in trade areas not covered by the other two organizations.

The ICC has been aggressive in raising the level of awareness for the need for trade facilitation. Since it represents industry, it is concerned with highlighting the constraints faced by traders from delays at international borders and frontiers. The ICC has supported the adoption of the revised World Customs Organization (WCO) Kyoto Convention (see table 9.1) suggested numerous improvements to the current GATT articles, and advocated the adoption of a multilateral agreement on trade facilitation administered by the WTO.

TABLE 9.1 Trade Facilitation Programs Sponsored by Selected International Organizations

Organization	Key areas	Main instruments
UNCTAD	Simplification and harmonization of trade procedures. Areas of focus are customs, transport, banking and insurance, information for trade, and business practices.	Columbus Ministerial on Trade Efficiency, Tradeport, Automated System for Customs Data (ASYCUDA)
WCO	Enhancement of efficiency of customs administrations in the areas of compliance with trade regulations, protection of society, and revenue collection.	Kyoto Convention, Harmonized Commodity Description and Coding System
World Bank	Project lending (transport, customs, quality standards, and simplification of procedures); technical assistance loans (customs modernization); and policy advice (export promotion and competition).	Regional trade facilitation work programs and projects
APEC	Core areas are standards and compliance, customs procedures, and mobility of businesspeople. Other areas include nontrade barriers, services, deregulation, rules of origin.	Collective action plans, individual action plans
FTAA (ongoing negotiations)	Temporary imports, express shipments, simplified procedures, electronic systems, Harmonized Commodity Description and Coding System, guide to customs procedures, codes of conduct, and risk analysis.	Customs-related business facilitation measures at ministerial meetings
ICC	Customs modernization and simplification of trade procedures (by contributing to efforts by the World Customs Organization and the WTO). Advocates ratification of the WCO Kyoto Convention and formulates policy proposals on transport, e-commerce, investment, and service.	Research, industry interface, lobbying, customs guidelines

Sources: Compiled from information provided in Wilson and others (2002); <http://www.iccwbo.org>.

9.2.1 A Spaghetti Bowl of Obligations and Commitments

Intergovernmental and regional groups are active in four main areas: trade facilitation, customs procedures, regulatory reform, and electronic commerce (table 9.2). Numerous organizations in addition to those shown are working in this area, with great potential for overlap in commitments and regulations. These include regional trading agreements, which also share many principles and concepts (table 9.3).

There is significant overlap in the initiatives of organizations involved in trade facilitation. Wilson and others (2002) note that “these organizations have worked primarily in parallel tracks, with limited mechanisms for coordination. If these institutions established new consultation mechanisms, they could accomplish more collectively in accelerating trade facilitation goals” (85). Another concern is the lack of transparency between organizations—coordination and cooperation for mutually supportive actions is possible only when international or regional groups work together in an open environment.

A cursory look at ratified agreements on trade facilitation reveals several points. First, industrial countries have accepted or acceded to more trade facilitation instruments than developing countries: EU members and accession candidates are

TABLE 9.2 Interests of Selected International Organizations in Trade Facilitation

Institution	Trade facilitation	Customs procedures	Regulatory reform	E-commerce
World Bank	*	*		
ADB	*			
APEC	*	*	*	*
FTAA				*
G-7		*		
ICAO		*	*	*
ICC				*
IDB	*			
IMF		*		
IMO		*	*	*
OECD			*	*
UNCEFACT			*	*
UNCTAD	*	*		*
UNECE		*	*	*
WCO		*	*	*
WTO		*	*	

Sources: Compiled from Wilson and others (2002) and OECD (2002).

Note: ADB = Asian Development Bank; IDB = Inter-American Development Bank; UNCEFACT = United Nations Centre for Trade Facilitation and Electronic Business.

TABLE 9.3 Principles and Concepts Central to Trade Facilitation in Regional Trading Agreements

Regional trading agreement	Rules on transparency and due process	Harmonization of procedures and formalities	Simplification and avoidance of unnecessary restrictiveness	Modernization and the use of new technology
APEC	*	*	*	*
EFTA	*	*	*	
NAFTA	*	*	*	*
ASEAN	*	*	*	
WCO	*			
Mercosur		*		
EEA			*	
ANZCERTA		*		
Aus/NZ Customs agt				*

Source: Compiled from OECD 2002.

Note: ASEAN = Association of Southeast Asian Nations; ANZCERTA = Australia New Zealand Closer Economic Relations Trade Agreement; EEA = European Economic Area; EFTA = European Free Trade Association; NAFTA = North American Free Trade Agreement.

the only countries to have signed the UNECE convention on the simplification and harmonization of customs procedures. Second, more countries have accepted or acceded to the IMO and ICAO, the 500th revision of the ICC's Uniform Customs and Practices for Documentary Credits (ICC UCP 500), and the Harmonized Standards Convention from the WCO than to UNECE agreements or other WCO agreements. Third, the African, Caribbean, and Pacific states participate in few agreements on trade facilitation.² In principle, the WTO offers the possibility of consolidating (elements of) existing international initiatives and agreements on trade facilitation, with the goal of eliminating overlaps and duplication.

9.2.2 Trade Facilitation and the WTO

WTO discussions on trade facilitation began after the Singapore Ministerial Meeting in 1996. The WTO defines trade facilitation as the "simplification and harmonization of international trade procedures, including activities, practices, and formalities involved in collecting, presenting, communicating, and processing data required for the movement of goods in international trade" (<http://www.wto.org>). Activities covered by the WTO definition include transport, payments, and electronic facilities, as well as issues related to customs and border crossing. These include documentation requirements; official procedures; automation and use of information technology; transparency, predictability, and consistency; and modernization of border-crossing administration.³

Trade facilitation is already covered by WTO agreements. Relevant articles include GATT Articles V, VII, VIII, and X and the agreements on customs valuation, import licensing, preshipment inspection, rules of origin, technical barriers to trade, and application of sanitary and phytosanitary measures. The Singapore Ministerial Conference mandated that only GATT Articles V, VIII, and X be considered for multilateral negotiations. Article V relates to the freedom of transit of goods and transportation vessels across territories. Article VIII covers the fees and formalities associated with importing and exporting goods. Article X relates to the publication and administration of trade regulations (that is, measures to ensure transparency). Common features of the existing legal framework include requirements such as fair and equitable administration of procedures (agreements on import licensing, preshipment inspection, and rules of origin); publication of laws and regulations prior to application (all agreements); and the right to appeal administrative decisions (customs valuation, import licensing, and preshipment inspection).

A number of cases have been brought to the WTO dispute settlement body that involve either customs procedures or technical regulations and fall under GATT Articles VII, VIII, and X or the agreements on licensing procedures, technical barriers to trade, sanitary and phytosanitary standards, rules of origin, or customs valuation. Numerous disputes and requests for consultations have related to customs procedures or technical regulations since the WTO was formed (for a summary, see annex table 9A.2). While these disputes were being aired, developments in the WTO on trade facilitation continued. In March 1998 the WTO held a trade facilitation symposium that involved both traders and trade policy officials. The symposium highlighted the following issues as being of greatest importance to traders:

- Excessive documentation or procedural requirements
- Lack of automation and insignificant use of information technology
- Lack of transparency
- Unclear and unspecified import and export requirements
- Inadequate procedures, especially a lack of audit-based controls and risk assessment techniques
- Insufficient cooperation among customs and other government agencies
- Backward techniques, which thwart efforts to deal effectively with increased trade flows.

The failure to launch a new round in Seattle allowed the WTO to conduct further exploratory and analytical research. In 2000 work was organized into three categories: national experiences, WTO principles and trade facilitation measures, and technical assistance and capacity building. Developing countries voiced

legitimate concerns that additional rules should be implemented slowly or not implemented at all in order to reduce their exposure to dispute settlement. Some developing countries argued that there was no need for additional WTO obligations, especially as they were still struggling to implement Uruguay Round rules on customs valuation. Developing countries also expressed concern that new rules on trade facilitation could overlap or interfere with other programs of organizations such as the WCO, UNCTAD, and the World Bank.

In the run-up to Cancun, Brazil, India, and other countries challenged the view that Article X needs reforming, as proposals for reform failed to show its deficiencies. Reform, they argued, should proceed by reworking existing obligations rather than adopting new ones. India argued that the patterns of trade of developing countries are very different from those of industrial countries (which are dominated by intrafirm trade of multinational corporations) and therefore any new disciplines cannot follow a “one size fits all” approach. Malaysia stressed that rule-making alone will not build a customs infrastructure in developing countries (<http://www.twinside.org.sg>). Many developing countries felt that trade facilitation should be undertaken unilaterally (or regionally), among parties that are more likely to have similar domestic capacity and needs. Winters (2002) points out that the WTO agenda on trade facilitation is potentially useful but restricted: “Where developing countries need physical infrastructure and corruption-free customs, the negotiations will focus on transit rules, customs fees, and the publication of trade regulations” (33).

Proponents of further initiatives on trade facilitation in the WTO included Australia, Canada, Chile, Colombia, Costa Rica, the European Communities, Hong Kong (China), Hungary, Japan, the Republic of Korea, Morocco, New Zealand, Norway, Paraguay, Singapore, Switzerland, and the United States. The 32-member Colorado Group proposed a two-track approach to negotiations: binding rules on WTO provisions (Articles V, VIII, X) and WTO principles (transparency, due process, simplification, efficiency, and nondiscrimination) and technical assistance and capacity building. This approach is similar to that taken to “build up” agreements on certain provisions of the GATT (technical barriers to trade, countervailing duties, and antidumping) during the Tokyo Round. However, only a few countries submitted proposals to the WTO. They included Australia (general proposal); Canada (Articles V, VIII, X); Colombia (Article VIII); the European Communities (Articles V, VIII, X); Hong Kong (China) (Article VIII); Japan (Articles VIII, X); Korea (Articles V, VIII, X); and the United States (Article VIII). Special submissions were also made with respect to the benefits of a rule-based system, special and differential treatment, technical assistance, and capacity building.⁴ What follows summarizes some of the proposals submitted during 2000–03.

Article V GATT: Freedom of Transit. Canada, the European Communities, and Korea all proposed simplifying, limiting, and standardizing customs procedures and documentation requirements, as well as clarifying the fees and charges for customs services. They also agreed that technical assistance and capacity building must be part of any new multilateral initiative. The European Communities proposed the most ambitious reforms for Article V, seeking to redraft sections of the article and extend its scope. They maintain that conditions have changed since the article's drafting and that real freedom of transit is often thwarted:

Traders seek, as a matter of priority, simple, transparent international transit regimes that correspond to the just-in-time business methods and integrated multicountry supply chains increasingly applied throughout the world. As international trade increases, the volume of transit operations does likewise, making it all the more essential to review or improve transit and to ensure coherence and co-ordination between the actions taken in the various international fora dealing with transit related matters.⁵ (GCW422)

The European Communities proposed broadening national treatment on modes of transport to include new modes of carriage of oil, gas, and other products through pipelines or other means, which may also fall within the scope of transit.⁶ It called for an examination of the reality of applying national treatment between individual carriers and between types of consignment, but it was quick to point out that any discussion relating to the services provided by carriers was something for GATS negotiations. The European Communities also made suggestions regarding implementation for developing countries. Rather than just promising technical assistance and capacity building, it proposed specific amendments to ensure special and differential treatment for developing countries. These included:

possible differentiation in commitments, particularly for least developed countries, but also possibly for other developing country Members with specific needs or facing specific difficulties in implementing commitments which may carry appreciable resource implications; the use of transitional periods to enable progressive implementation of the results, at a pace and in a manner suited to the needs of developing country Members; and action to improve the quality, quantity and co-ordination of technical assistance, aimed at improving the conditions of transit for developing countries, including through more systematic co-operation between donor bodies and recipient Members, while involving as appropriate the private sector. (GCW422)

Canada argued for greater clarification of Article V in light of the changes in transit and customs procedures since the drafting of the original article. Though

not as ambitious as the proposals made by the European Communities, the Canadian proposal aimed to improve the article and to strengthen commitments:

We agree that the provisions of Article V are, in some instances, lacking in specificity and that clarifications and improvements are warranted. . . . The purpose of these suggestions is to highlight areas where the provisions of Article V might be improved, notably by taking account of international developments in the transit field. We believe that ease of transit is a matter of interest to all WTO Members since its impediment results in considerable inconvenience and extra and unnecessary cost burdens that ultimately affect everyone. (GCW424)

Canada's proposals regarding Article V included extending national treatment but only regarding internal taxation and regulation of goods. It also proposed the possible use of surety bonds and risk management principles and the promotion of accession to various nonWTO transit agreements. With respect to technical assistance and capacity building, Canada did not go very far in suggesting practical means of implementation. Its position was that this should be pursued through member discussions on how best to identify, coordinate, and deliver technical assistance in the context of implementing future commitments in trade facilitation.

Like the European Communities, Korea argued that while Article V of the GATT set out basic principles regarding transit traffic, it did not provide detailed guidelines for applying these principles and did not give due consideration to the different risk levels involved in transit with and without transshipment (GCW423). It stressed cooperation and sharing of information among customs authorities, harmonization of policies, standardization and uniformity of data sets, and transparency. The Korean submission also suggested that "[e]xisting international agreements or studies such as the Kyoto Convention and the ASEAN Framework Agreement on the Facilitation of Goods in Transit can be good starting points for future discussion." With respect to special measures for developing countries and LDCs, Korea noted the need for technical and direct financial assistance to install electronic data systems to expedite the processing of goods in transit.

Article VIII: Fees and Formalities. Many countries seem to favor the "single-window" approach at border points and the simplification, reduction, and standardization of documentation and data requirements and procedures. Once again technical cooperation and capacity-building initiatives are called for in conjunction with reforms. The European Communities maintained that Article VIII merely "recognises the need for reducing the incidence and complexity of import and export formalities to the minimum," neither requiring any such reduction nor indicating how to achieve it. Specifically the European Communities maintained that "Article VIII merely 'recognises the *need for* reducing the incidence and complexity of import and export formalities to the minimum' but neither *requires*

any such reduction nor indicates how to achieve it. Similarly, it also ‘recognises the *need* for reducing the number and diversity of fees and charges’ but again does *not create any commitment* actually to do so. The absence of any operational WTO requirements to simplify or reduce fees and formalities—notably unduly cumbersome border formalities—remains a significant weakness in the WTO rule book which, as tariffs are progressively reduced, has become more and more in need of attention” (emphasis in original) (GCW394).

The European Communities stressed clarification regarding fees and charges and the need for a uniform customs code. It favored nondiscrimination in modes of transport and supported initiatives in automation and risk assessment. It also proposed the standardization of import and export procedures, based on international standards and instruments (for example, adoption of the WCO’s Revised Kyoto Convention). To accommodate the concerns of developing countries, the European Communities suggested that “any future WTO provisions include a range of special and differential treatment provisions, including less onerous initial commitments for poorer developing countries, transitional periods for the assumption of commitments, and more stable provisions regarding the supply of technical assistance” (GCW394).

Canada’s proposal for improving Article VIII was broad in scope. It suggested that countries would become more competitive in the international trading system as a result of introducing business- and user-friendly amendments to trade procedures (in this case, fees and charges). Canada’s aim was to close the gaps between industrial and developing countries:

In consideration of the existing and significant technology gap that currently exists in the trading environment, the proposals for simplification and for effective procedures should be applicable and useable in either a nonautomated or a technology-based environment. In both cases, these can serve to promote efficiencies, enhance transparency and minimize procedural delays with the primary difference being the degree of change that is achieved. (GCW397)

To achieve this objective, Canada recommended standardizing and making compatible data sets. It proposed the possibility of forging agreements on the coordination of procedures and formalities between agencies. It also supported the use of risk assessment principles and the provision of collateral and monetary security (that is surety bonds), which would create an enhanced clearing system that ensures that obligations to customs divisions on imports, exports, warehouse operations, or international transporters of goods are discharged. Surety bonds shift the credit exposure from the company to the surety bank, giving traders added flexibility in the import process and giving the government certainty that trader obligations will be met. This would increase the predictability and reliability needed for new commercial transactions.

Colombia supported improvement of Article VIII in order to avoid protectionism and improve competitiveness:

Within the framework of the multilateral trading system, the headway made with regard to disciplines in trade policy and transparency of national legislation is clear. There is, however, a large grey area as regards streamlining the handling of some trade-related requirements and administrative procedures, which continue to be dealt with as a matter of autonomous policy. Agreements on technical standards and sanitary measures, for example, provide for a number of criteria for adopting standards and regulations, but no progress has been made as regards the requirements and costs involved in obtaining registration, certification or recognition. (GCW425)

Its proposal suggested the possibility of accession to various international agreements, including the Kyoto Convention. It also stressed the need for special and differential treatment for developing countries.

Korea's submission stressed the need for a proper information technology structure to ensure implementation of modern customs techniques, distinguishing between what is needed and what is feasible. Rather than commit to technical assistance and capacity building, it suggested that some key changes carry a light burden of implementation. Others that do not (including those which require information technology systems) should be discussed further with other members.

Article X: Publication and Administration of Trade Regulations. The Canadian, EU, Japanese, and Korean submissions argued that Article X needs to be updated to reflect the importance of transparency and predictability in determining trade flows. This includes widening the scope of information to be published, increasing the number of inquiry points, and establishing a prior consultation mechanism. The countries agreed on the permissibility of advance rulings and a nondiscriminatory, legal right of appeal. Technical cooperation and capacity-building initiatives were also proposed.

The European Communities submitted the most ambitious proposal for improving Article X. It suggested that since transparency and predictability are cornerstones of WTO agreements, changes need to be made to Article X in order for countries to fully realize the benefits of trade liberalization and to properly exercise their rights and commitments:

[t]his Article has stood unchanged since the 1940s, but some of its concepts—concerning, for example, transparency, advance notice of proposed trade rules, and right of appeal against administrative decisions, have since been developed further in the national regimes of some Members, in specific Marrakech Agreements on trade in goods, or in other international instruments. Modern principles of sound and transparent public administration have, in other words, overtaken GATT Article X since it was first negotiated. (GCW363)

The European Communities emphasized the commitment to transparency, through the publication and availability of all relevant information. It also suggested establishment of inquiry points or trade desks to facilitate transparency, as well as advance rulings to speed up the process. In line with its transparency requirements, the European Communities proposed that governments set up consultative or feedback mechanisms and appeal procedures to ensure nondiscriminatory and fair treatment.

According to the European Communities,

[It] is important that Members provide *Technical Assistance* to assist developing countries, especially least developed, to establish requisite information platforms, particularly in electronic format, in order to fulfil transparency requirements. Where necessary, assistance may also be provided to support the implementation of other commitments that Members may enter into based on the above proposals. The possible scope and nature of, special and differential treatment provisions for, in particular, the least developed countries, also needs further discussion (GCW363, emphasis in original document).

It proposed undertaking bilateral technical assistance programs:

Assistance to transparency is often provided through the creation of databases and enquiry points for traders, in particular SMEs [small and medium enterprises]. Many Members already operate specific systems, such as trade points, or investment desks, which demonstrate the feasibility of introducing such facilities. The EC regards this as a useful component of trade related assistance in the short to medium term and will endeavour to address this in its bilateral technical assistance programmes. (GCW363, italics in original)

Canada's submission was consistent with that of the European Communities. The intention was to promote the WTO principles of transparency, due process, integrity, efficiency, simplification, and consultation. Canada echoed the call for trade facilitation reform in order to allow countries to take advantage of new trading strategies. With respect to developing countries, it offered knowledge and experience sharing. It also suggested that "Members will need to discuss in greater detail how best to identify, coordinate and deliver technical assistance where and when it is needed to implement future commitments on trade facilitation" (GCW363).

Japan concurred with most of the above proposals. It advocated clarification with respect to the publication and accessibility of all laws and regulations in order to identify the elements that should be provided as well as the means by which countries can publicize this information. It noted that cooperation with other international organizations is important:

There are certain international organizations which have the expertise in the area of trade facilitation, for example, the WCO in the field of customs procedures. Any

existing work done by such international organizations should be taken into account in order to ensure technical assistance in this area and to avoid any unnecessary duplication from the viewpoint of work efficiency (GCW376).

Korea reiterated its suggestion that countries must focus on what is most needed and what is feasible:

In examining various ideas, Korea finds it important to consider two basic criteria: (1) the level of contribution in facilitating trade, and (2) feasibility. Any proposal or idea should be evaluated and prioritized according to how much it can contribute and how easily it can be drawn into relevant WTO rules and be eventually implemented. What S&D [special and differential treatment] or TACB [technical assistance/capacity building] package it offers should also be taken into account in assessing the feasibility. (GCW377)

Korea's proposal is close to those of the European Communities and Canada, though it focuses more on improving the technical capabilities of countries and stresses the need for a single national focal point, notification of core measures, and liaison with other authorities. With respect to specific capacity-building initiatives, Korea suggested that donor members support the provision of translation services to developing country members and relax the period for notification.

Following the failure of Cancun, there were few official submissions or reports to the WTO on the Singapore issues. A joint communication from a group of LCDs posited some reasons for the failure of negotiations on the issues and some suggestions for the future.⁷ It states, "A large number of developing country Members expressed concern, *inter alia*, about the impact that multilateral rules on the four Singapore issues would have on their domestic policies and the fact that they have neither the negotiating resources nor the capacity to implement obligations, which such multilateral rules will entail" (GCW522). With respect to trade facilitation in particular, the LDCs suggest that any work on trade facilitation must address the cost of compliance, justification for binding rules subject to the Dispute Settlement Understanding, and commitment to technical assistance to aid with compliance and implementation.

The Report of the WTO Council for Trade in Goods highlights some of the discussions on trade facilitation undertaken during the year. The last meeting of the council, held before Cancun, addressed the three core agenda items: Articles V, VIII, and X of the GATT; trade facilitation needs and priorities, in particular of developing countries and LDCs; and technical assistance and capacity building. During this meeting some of the issues that caused disagreement in Cancun were raised. Several countries pointed to the difficulties in creating and adopting binding rules and called for further discussions on developing nonbinding guidelines.

One delegation suggested that such guidelines could serve as “best practice” for reforming domestic rules in trade facilitation. Once possible reforms were developed and technical assistance needs identified, these nonbinding rules could be transformed into binding rules once developing countries developed their internal capacities.

9.2.3 The Cancun Failure and the 2004 Doha Work Programme

The Fifth Ministerial in Cancun collapsed on September 14, 2003, without an agreement, mainly because countries’ positions, particularly on the Singapore issues, were too far apart. A paper published by the British House of Commons (UK House of Commons 2003) following Cancun summarized some of the reasons that led to the collapse of negotiations. With respect to the Singapore issues, it noted that too few countries were persuaded that a deal that would benefit them would actually be realized and that the European Communities’ enthusiasm for the Singapore issues was not matched by similar enthusiasm on agricultural reform. A post-Cancun paper by the European Communities argued that the objections to negotiations on modalities centered on “(1) reluctance of some developing countries to enter into binding international commitments that could restrict their ‘policy space’; (2) apparent absence of negotiating capacity for some developing countries; and (3) the reluctance of some developed countries to tie their hands to a multilateral rather than a bilateral or a unilateral approach to investment and competition.”

As of December 2003, there appeared to be little prospect for a consensus on the way forward. “[T]he EC said it accepted the unbundling of the [Singapore] issues, and said it could accept one or more issues falling outside the current negotiating structure. Bangladesh raised concern with the undue emphasis falling on the Singapore issues, and called for more focus on development issues. India supported a multilateral deal to enhance the power and abilities of customs authorities. South Africa said the Singapore issues should not hold up talks in other areas, said investment and government procurement no longer were a part of the single undertaking, and opposed a plurilateral approach to the Singapore issues. Korea wanted negotiations to proceed on all four issues” (Bridges 2003, 2). Many developing countries continued to maintain that the Singapore issues should be dropped altogether.

Due mainly to efforts by U.S. Trade Representative Robert Zoellick, negotiations were revitalized in the winter of 2004. This resulted in agreement on a new framework for negotiation modalities that included trade facilitation but

excluded the other three issues. A unique dimension of the deal on modalities that was negotiated is that assurances are provided to developing countries that the costs associated with implementation of an agreement on trade facilitation will be met through technical assistance and support for capacity building, including infrastructure development. An annex on trade facilitation states that in the absence of adequate support, implementation of obligations will not be enforceable. Thus an explicit linkage was established between implementation of any agreement and technical and financial assistance provided by developed countries.⁸

9.3 Does Trade Facilitation Belong in the WTO?

As argued above, there is a clear case for international collective action on trade facilitation. But is the WTO the right forum for this action? Other international organizations are already involved in this area. Why strengthen the role played by the WTO?

One reason to do so is that although existing international measures may result in improvements, the effects are probably limited and certainly piecemeal. Overlaps in obligations and commitments, specifically in the areas of work programs, customs procedures, regulatory reform, and e-commerce, all point to a failure of coordination. Consolidation could help make rules and obligations consistent and transparent.

Some parties have argued that the WCO Revised Kyoto Convention already provides the appropriate regulatory framework for trade facilitation.⁹ Van Bodegraven (1999) argues that although the Kyoto Convention is an important step in the right direction, it is “not a panacea for all problems related to customs that some people believe it to be. For example, the Kyoto Convention will not solve existing inefficiencies in the organization of customs administrations, rivalry between official control agencies, or problems of integrity. Only a well-balanced reform and modernization program, together with the necessary funds to implement the recommendations, will solve these more fundamental problems” (45).

Multilateral agreements exist, but it is unclear how much compliance there is. Without binding and enforceable rules, would countries meet their obligations? The ICC suggests that signatories would not:

The World Customs Organization has proposed remedies that include adequate remuneration for customs officials, internal and external auditing and fair rules for appointments and promotion. But the question remains: how are these and other recommendations to be translated into effective action? The WCO is an irreplaceable source of detailed expertise, but lacks the power to put a political head of steam behind its proposals. That must be remedied. (Cattaui 1998)

This suggests that in addition to the lack in coordination, current international initiatives are not universally adoptable or enforceable.

The advantages of making commitments at the WTO are fourfold. First, the WTO already has a large membership of countries, which joined the WTO in hopes of increasing trade and prosperity. Second, the WTO offers possibilities for scope and reduced overlap and strong internal and external incentives for compliance. According to the ICC, “political commitment to multilaterally binding rules on trade facilitation, administered by the WTO, would steer reform in a consistent direction and benefit all parties in international transactions.”¹⁰ Third, building on the WTO principles of nondiscrimination, transparency, and least trade restrictiveness, an agreement could draw on the existing work and results of other international institutions and regional groupings. The WTO could provide a framework for intergovernmental organizations (the European Bank for Reconstruction and Development, UNCTAD, the World Bank) to provide funds and training to improve trade facilitation. Finally, since trade facilitation improvements touch so many different areas (including services, technical barriers, trade remedies), the synergies among these different areas can be fully exploited during negotiations.

Regional initiatives and other international institutions should play a supporting role in achieving real progress in trade facilitation at the WTO. The WCO, APEC, and the United Nations Centre for Trade Facilitation and Electronic Business could play advisory roles on technical matters. Together they deal with facilitation of customs procedures, transport, and administration issues. APEC, in particular, believes it can play a coordinating role in developing multilateral trade policy reform measures and technical assistance and capacity-building programs.

9.4 Concluding Remarks

WTO members have long recognized the importance of cutting red tape at customhouses, improving efficiency, and reducing unnecessary delays affecting cross-border commerce. They recognize the fact that countries can effectively renege on prior commitments to liberalize by using customs measures to discriminate against foreign goods. This traditional motivation for negotiating multilateral disciplines on trade facilitation is strengthened by the emergence of international production techniques that necessitate predictable, fast, and inexpensive transit across borders of goods along the production chain. These factors are critically important to developing countries interested in joining global or regional production networks, with the eventual goal of climbing up the value chain to more sophisticated and higher-priced products. The phenomenal growth of trade in parts and components is indicative of the strength of these technological

changes. Without improvements in trade facilitation, firms in developing countries will not be able to take advantage of some of the key opportunities offered by recent changes in the global commercial landscape.

One response to the greater imperative for trade facilitation is to extend and elaborate on existing regional agreements and nonbinding international cooperative initiatives. Regional initiatives do not have global membership, and they differ markedly in terms of the disciplines on signatories and the degree of compliance. That is not to say that regional initiatives are ineffective or counterproductive. Rather, it suggests that they do not offer a comprehensive solution to the challenge at hand.

As to existing nonbinding international initiatives, a complex web of overlapping but piecemeal obligations has emerged. Worse still, ratification and implementation of obligations have fallen short. These considerations, and bottlenecks to unilateral reform, provide a rationale for an international accord on trade facilitation that has enough teeth to encourage compliance. Moreover, with improvements in trade facilitation requiring initiatives in more and more areas of government policy, negotiations under the WTO umbrella offer the greatest potential for making connections across trade-related policy matters. In principle, complementarities can be identified and taken advantage of.

The growing range of measures that support trade facilitation, as well as the need to buttress compliance, also highlight a critical challenge facing policy makers. Although the benefits of improving trade facilitation are sizable, the implementation and institutional costs of improvements may be considerable. Finger and Schuler (2000) estimate that 16 areas of custom reform will each cost \$2.5 million in a representative developing country. Moreover, the expertise needed to implement these measures is in short supply. The traditional WTO response to implementation costs is to phase in commitments. While these are important, the approach taken in the 2004 Doha Work Programme to link commitments for capacity building and technical assistance to implementation of multilateral disciplines by developing countries is clearly superior. Here there is an obvious link to and opportunity for consolidating the numerous regional and international programs on trade facilitation into a coherent framework that addresses clearly defined national priorities (which may differ across countries according to their stage of development), fosters the creation of much needed expertise, and transfers best practices.

Another option available to negotiators is to consider differential obligations on distinct matters related to trade facilitation. For example, disciplines on the publication of trade regulations may involve few exceptions and shorter implementation periods than disciplines on freedom of transit.

In sum, changing production, communication, and transportation technologies have markedly expanded the number of government policies that bear on

trade facilitation. This, in turn, has altered the patterns of production of tradable goods within and across national borders. These changes call for a comprehensive response by policy makers in a number of policy areas, all of which could be integrated, at some future point, into a coherent multilateral framework on trade facilitation. The current approach in the WTO on trade facilitation, however, seeks to extend existing commitments rather than develop such a framework. Given that many of the benefits accruing from trade facilitation reforms arise from reforming the services sector, negotiation on GATS commitments ought to complement the planned negotiations on trade facilitation (World Bank 2004).

Notes

1. See annex D of the July Framework Agreement on the Doha Work Programme, entitled "Modalities for Negotiations on Trade Facilitation."
2. A new World Bank regional assistance strategy has been developed with the aim of improving trade links and enhancing the economic integration of six African countries (Cameroon, the Central African Republic, Chad, the Republic of Congo, Equatorial Guinea, and Gabon). The strategy seeks to build new roads and improve existing ones; modernize, streamline, and integrate the banking sector; and speed up transaction time at the ports and customs. These measures will reduce transaction costs and create infrastructure that facilitates the movement of goods, people, and capital.
3. See WTO (1998) for specific problems raised by participants and suggested policy remedies.
4. See Australia (2003), Canada (2003), Japan (2003), United States (2003), and WCO (2003).
5. All WTO documents can be found on the WTO site using the document numbers given.
6. The EC claims "GATT Art.V specifies that there should be no discrimination in treatment of traffic in transit via whatever mode (road, rail, inland waterway, air, etc.)." The EC's interpretation of Art. V (2) is that the words "no distinction shall be made which is based on . . . any circumstances relating to the ownership of goods, of vessels or of other means of transport are national treatment on modes of transport. However, since there is no jurisprudence, they could be interpreted to mean no other type of sea transport, in line with the use of the word *vessels*. This ambiguity is cause for greater clarification in the article.
7. Bangladesh, Botswana, China, Cuba, Arab Republic of Egypt, India, Indonesia, Kenya, Malaysia, Nigeria, the Philippines, Tanzania, Uganda, República Bolivariana de Venezuela, Zambia, and Zimbabwe.
8. See paragraphs 4, 5, and 6 of annex D of the August 2004 Doha Work Programme.
9. There are currently 37 contracting parties to the convention. The Revised Kyoto Convention will enter into force three months after 40 Contracting Parties to the Kyoto Convention (1974) sign the Protocol of Amendment without reservation of ratification or have deposited their instrument of ratification or amendment.
10. See http://www.iccwbo.org/homestatemnts_rulesstatements2001wto_members_on_trade.as.

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ANNEX

TABLE 9A.1 Estimated Costs and Benefits of Trade

Study	Costs included	Estimated costs
NCITD (1971)	Direct costs: documentation costs required by government, finance and insurance carrier, and forwarder/broker or contractual counterpart.	Average documentation costs: \$376 for exports and \$321 for imports. Total costs represent 7–12 percent of value of total U.S. export and imports.
Ernst and Whinney (1987a, b)	Direct costs: customs compliance costs. Indirect costs: road haulers and forgone business.	Customs compliance: 7,500 million ECU, road haulers: (415–830 million ECU); forgone business: (4,500–15,000 million ECU). Customs compliance costs about 1.5 percent of total intra-EC trade value; business forgone accounts for 1–3 percent.
SWEPRO (1985)	Direct costs: customs compliance costs.	Customs compliance costs are 4 percent of the value of imports or exports, 8 percent of the total value of goods traded.
EC (1989)	Direct costs: documentation.	Documentation costs are estimated to be 3.5–7.0 percent of the value of goods traded.
UNCTAD (1994)	Direct and indirect costs: banking and insurance, customs, business information, transport, telecommunication.	Transactions costs are \$400 billion (10 percent of total world trade value), trade transactions costs are 7–10 percent value of world trade.
Dee, Geisler, and Watts (1996)	APEC trade liberalization programs, including trade facilitation measures, technical barriers to trade competition policy, government procurement, and transparency.	None.
APEC (1997)	APEC trade liberalization programs, including trade facilitation measures, technical barriers to trade, competition policy, government procurement, and transparency.	Cites estimates by Cecchini, Catinat, and Jaquemin (1988); UNCTAD (1994); and Dee, Geisler, and Watts (1996), but did not indicate which estimate it used.
APEC (1999)	Update of 1997 paper. Dynamic CGE model characterized by perfect competition. Model estimates benefits of facilitation for all goods in APEC region.	Mentions costs of implementation of APEC's trade facilitation initiatives but does not foresee these costs as outweighing the gains.

TABLE 9A.1 (Continued)

Estimated benefits	Methodology
None.	Business survey.
None.	Business survey on lost business opportunities and road haulers.
None.	Some figures obtained from Swedish customs and businesses.
None.	No information about methodology.
One-quarter of \$400 billion of transactions costs (\$100 billion) can be saved by "efficiency" by 2000, about 2–3 percent of import value.	NCITD (1971), EC (1989).
5 percent of value of goods traded (trade facilitation measures only); 10 percent if technical barriers to trade, competition policy, government procurement, and transparency measures are taken into account.	Secondary sources.
Direct savings from trade facilitation are about 2–3 percent of total import value.	Secondary sources.
APEC trade liberalization and facilitation measures committed to date expand region's annual GDP by \$75 billion (in 1997 prices), 0.4 percent of the region's total GDP. Income gains would amount to \$90–\$105 billion, if various dynamic effects were taken into account.	

TABLE 9A.1 (Continued)

Study	Costs included	Estimated costs
Hertel, Walmsley, and Itakura (2001)	Dynamic CGE model, characterized by perfect competition. Model estimates impact of a regional trade area between Japan and Singapore and efficiency gains of customs automation and implementation of uniform standards for e-commerce.	1–2 percent in small trade costs for Japan and Singapore, emanating from customs paperwork and procedural costs.
APEC (2002)	Model estimates benefits from at-the-border reforms of customs procedures and behind-the-border infrastructure reforms for intra-APEC trade.	None.
Wilson, and others (2002); see Wilson, Mann, and Otsuki (2003, 2004) for a related study	Facilitation measures in Manila Action Plan for APEC (MAPA) include those contained in member countries' individual action plans, collective actions, Osaka Initial Actions, and the Information Technology Agreement. Looks at scenarios of improved trade facilitation: improved port logistics, standards harmonization, administrative transparency and professionalism, and e-business usage.	None.
Francois, van Meijl, and van Tongeren (2003)	Dynamic CGE model, characterized by imperfect competition and an input-output structure. Model estimates global benefits of facilitation in trade in all goods.	Transactions costs of 7–10 percent of value of trade.
OECD (2003a)	Impact of trade facilitation on trade transaction costs and subsequent welfare gains from these reductions. ^a	

TABLE 9A.1 (Continued)

Estimated benefits	Methodology
Income gains of \$6.6 billion (Japan) and \$0.17 billion (Singapore), representing 0.16 percent of GDP in Japan and 0.29 percent in Singapore.	
At-the-border benefits: \$2.3 billion for Singapore, \$1.2 billion for Thailand, \$0.4 billion for the Philippines. Behind-the-border benefits: \$6.2 billion for China, from reforming investment regulation; \$5.4 billion for Mexico, from road transport reform; and –\$1.6 billion for Australia from reforming port services.	GTAP model.
Gain of 0.26 percent of real GDP to APEC (about \$45 billion). Direct cost savings from trade facilitation of 1 percent of import prices for Korea, Rep. of, Taiwan (China), and Singapore and 2 percent for other developing economies.	GTAP model; bilateral trade handled using Armington assumption.
Under increasing returns to scale, \$72.9 billion income effect with a 50 percent liberalization of border measures. Under full liberalization, global gain of \$150 billion.	In addition to trade facilitation measures, measures effects of WTO Doha Round negotiations on agricultural liberalization, liberalization in industrial tariffs, and liberalization in services trade.
Trade facilitation initiatives assumed to reduce trade transactions costs by 1 percent of value of world trade. Under different trade treatment and country-specific benefits, aggregate welfare gains estimated at \$40 billion worldwide, with greatest benefits going to developing countries.	GTAP model. Analysis does not evaluate economic and trade impact of specific trade facilitation measures (that is, those that may come from future WTO agreement).

Source: Wilson and others (2002) and updated by the author.

Note: Estimates of costs and benefits cannot be compared directly because of differences in methodological approaches. CGE-computable general equilibrium; GDP = general domestic product; GTAP = Global Trade Analysis Project.

a. Other studies reporting estimates of trade transaction costs include METI (1998), Haralambides & Londoño-Kent (2002), and JETRO (2002).

TABLE 9A.2 WTO Dispute Cases Related to Trade Facilitation

Subject of dispute/cases	Year	Type of report/status	TF article or agreement covered (if any)
<i>Administration of laws and regulations</i>			
U.S.: stainless steel, antidumping measures	2000	Panel	Article VIII GATT
U.S.: certain EC products	2000	Panel	Article VIII GATT
U.S.: Offset Act (Byrd Amendment)	2002	Panel	Article X GATT
<i>Customs duties</i>			
India	1998	Consultations	
<i>Customs valuation</i>			
Mexico: NAFTA discrimination	1996	Consultations	
Brazil: minimum import prices	2000	Consultations	Agreement on Customs Valuation, Agreement on Import Licensing
Romania: measures on minimum import prices	2001	Mutual solution	Agreement on Customs Valuation
<i>GSP coverage</i>			
EC: India	2002	Request for consultations	
EC: Thailand	2002	Consultations	
<i>GSP preferences, import measures</i>			
EC: sale, important, and distribution of bananas	2002	Adopted by EC	Agreement on Import Licensing
<i>Health or technical regulations</i>			
EC: hormones	1998	Appellate Body (AB)	Sanitary and phytosanitary measures, technical barriers to trade
Japan: agricultural products	1999	AB	Sanitary and phytosanitary measures
Australia: salmon	1998, 2000	AB Article 21.5	Sanitary and phytosanitary measures
Japan: apples	2003	AB	Sanitary and phytosanitary measures
<i>Implementation</i>			
U.S.: underwear	1997	AB	Article X GATT
U.S.: hot-rolled steel	2001	AB	Article X GATT
U.S.: corrosion-resistant Steel Sunset Review	2003	Panel	Article X GATT

TABLE 9A.2 (Continued)

Subject of dispute/cases	Year	Type of report/status	TF article or agreement covered (if any)
<i>Import licensing</i>			
Indonesia: autos	1998	Panel	Article X GATT
Brazil	1999	Consultations	Agreement on Import Licensing
Korea, Rep. of: beef	2000	Panel	Agreement on Import Licensing
<i>Implementation/import licensing</i>			
EC: poultry	1999	AB	Article X GATT, Agreement on Import Licensing
<i>Import measures</i>			
Nicaragua: measures affecting imports from Honduras and Colombia	2000	Panel request and consultations	
U.S.: Section 301–310	2000	Panel	Article VIII GATT
U.S.: EC products	2001	AB	Article VII GATT
Australia: fresh fruit and vegetables	2002	Consultations	Agreement on Import Licensing, sanitary and phytosanitary measures
Australia: fresh pineapple	2002	Consultations	Sanitary and phytosanitary measures
<i>Import and export restrictions</i>			
India: import restrictions	1998	Consultations	Agreement on Import Licensing
India: import and export restrictions	2003	Consultations	Article X GATT, sanitary and phytosanitary measures, technical barriers to trade, Agreement on Import Licensing
<i>Import tax, technical regulations</i>			
Argentina: footwear	1998	AB	Articles VII GATT, VIII GATT, technical barriers to trade
<i>Import tax</i>			
Argentina: measures affecting export of bovine hides and import of finished leather	2000	Panel	Article X GATT

TABLE 9A.2 (Continued)

Subject of dispute/cases	Year	Type of report/status	TF article or agreement covered (if any)
<i>Publication requirements</i>			
Japan: photographic film and paper	1998	Panel	Article X GATT
<i>Rules of origin</i>			
U.S.: textiles	2003	Panel	Article X GATT
<i>Technical regulations</i>			
U.S.: restrictions on imports of tuna	Unadopted	Panel	Article IX GATT
EC: scallops	1996	Panel	Technical barriers to trade
U.S.: gasoline	1996	AB	
U.S.: import prohibition on certain shrimp and shrimp products	1998	Article 21.5	Technical barriers to trade
EC: asbestos and asbestos-containing products	2001	AB	Technical barriers to trade
EC: sardines	2002	AB	Technical barriers to trade
<i>Regulations, import licensing</i>			
EC: butter	Unadopted	Panel	Technical barriers to trade, import licensing

Source: Compiled by the author from the WTO legal database (<http://www.wto.org>).

INVESTMENT INCENTIVES AND MULTILATERAL DISCIPLINES

BVR Subrahmanyam

The one dimension of investment-related policies on which most economists agree there is a clear case to consider international cooperation is investment incentives. These are a common policy instrument for attracting foreign direct investment (FDI) or inducing investors to remain in a particular country. Both developed and developing countries use such incentives.

Although incentives are among the most important potential policy areas that might be the subject of negotiation on investment disciplines, comprehensive information on the magnitude and incidence of investment incentives is lacking. Studies have been conducted on the use of investment incentives, but comprehensive cross-country information on the use of investment incentives is not available.

This chapter has two objectives. The first is to report the results of an effort to collect data on the use of investment incentives across countries. How different is the use of such incentives in developed and developing countries? How similar is the use of incentives among developing countries? The database, compiled through a survey of investment incentives, enables the patterns of usage of investment incentives to be compared, revealing a significant difference between developed and developing countries. More strikingly, similar incentive usage patterns produce different investment flows in different regions.

The second objective of this chapter is to explore the extent to which current World Trade Organization (WTO) rules affect investment incentives. This is particularly relevant given that multilateral rule making in this area has been put off. Examination of the prevailing investment incentives for WTO consistency illustrates that current disciplines can easily be bypassed. This suggests the need for improved regulation.

The chapter is organized as follows. Section 10.1 examines the rationale for employing investment incentives. Sections 10.2 and 10.3 describe the database on investment incentives and analyze the use of such incentives by region. Sections 10.4 and 10.5 examine current WTO rules on investment incentives and the consistency of existing incentive programs with these rules. Section 10.6 highlights additional problems for developing countries in dealing with investment incentives. Section 10.7 outlines approaches for future discussions on regulating investment incentives.

10.1 Rationales for Investment Incentives

Countries often see FDI as beneficial for their economic growth and put in place a range of policies to attract FDI. These efforts are often coupled with some controls that seek to direct some of the benefits of FDI toward achieving specific policy goals. Among policy tools to attract investment, incentives are an important category.

One rationale for providing investment incentives is to capture spillovers—that is, the benefits that are not captured by the firm making the investment. Some of these spillover effects—technological upgrading, improvement of managerial know-how and employee skills, transfer of firm-specific assets to the host country, improved market access for exports—are positive externalities, which create more value for the host country than for the investing firm. These externalities create a wedge between the private and social rates of return to FDI and may result in market failure in the form of a level of investment that is too low. Incentives are supposed to bridge this gap between private and social rates of return.

Another rationale for incentives is to adjust for the dynamic effects of FDI, such as the technological upgrading of the domestic industry and cost reductions by domestic firms resulting from “learning by doing.” Firms may not capture these dynamic effects in their internal financial projections and decision making as to whether to invest. Incentives can enhance the attractiveness of the initial investment decision for a firm.

Incentives are often used to compensate for an unfavorable policy environment. In developing countries, many economic activities are either controlled by the government or heavily regulated. This leads to a distorted price regime, which may reduce firms’ returns. Incentives can compensate for an adverse economic environment.¹ Sometimes incentives are given for investments in which there is an element of subsidization or carrying costs that governments themselves may not be in a position to manage. These carrying costs are loaded onto private investors, who are compensated through incentives.²

Another argument for providing investment incentives is their potential for promoting regional or sectoral development, a common policy objective of many governments. The reasons typically given include the externality, learning by doing, unfavorable policy environment, and public cost arguments mentioned above. Incentives attempt to achieve all or some of these objectives by increasing the rate of return for the investing firm, reducing the costs and risks associated with an investment, or redistributing the costs and risks associated with an investment. A wide range of incentives and related programs are used.

10.2 A Database on Investment Incentives

Investment incentives can be defined as “any measurable economic advantage afforded to specific enterprises or categories of enterprises by a government in order to encourage them to behave in a certain manner” (UNCTAD 1996, 3). Such a definition generally excludes any broad nondiscriminatory policies, such as the general provision of infrastructure or regulatory and fiscal regimes that apply to all sectors. This definition of an incentive lays down some of the key elements that constitute incentives: they provide an economic advantage, are measurable, are afforded to a few or a few categories of enterprises, aim to influence investment decisions by firms, and exclude nondiscriminatory policy and regulatory frameworks that extend across all sectors.³

The use of incentives is widespread and the range of incentives used large. Incentives can be accompanied by conditions imposed by the host country, or they may be granted unconditionally. Some incentives are negotiated on a case-by-case basis. They can also be applicable to all investment (domestic and foreign), to FDI alone, or to certain sectors or activities. Both national and subnational governments offer incentives.

To accommodate the huge diversity of incentives in practice, in collecting data, the focus was limited to manufacturing activities; incentives for services were excluded. Mining, infrastructure, fishing, oil and gas, and agriculture were also excluded, in order to ensure uniformity in data to the extent possible. Incentives for small and medium-size enterprises were also excluded. The database is also limited to incentives provided by national governments.⁴ For some countries it was difficult to distinguish between nondiscriminatory investment and FDI incentives. Hence these were combined for most countries. Finally, incentives come with many conditions. If an incentive is offered by a government, it was included in the database, irrespective of the conditions attached.⁵

Classification of incentives was done on the lines of the classification used by United Nations Conference on Trade and Development (UNCTAD) (1996).

TABLE 10.1 Fiscal, Financial, and Other Incentives Used to Attract Investment

Type of incentive	Examples
<i>Fiscal</i>	
Profit-based tax concessions	<p>Concessionary income tax rate</p> <p>Tax holidays, exemptions, deferrals</p> <p>Write-off for holiday period loose</p> <p>Exemption/reduction from withholding tax/dividend tax</p> <p>Exemption from minimum flat rate income tax</p> <p>Complete exemption from all taxes</p>
Capital investment-based tax concessions	<p>Accelerated depreciation</p> <p>Investment/reinvestment allowance</p> <p>Exemption from capital taxes</p>
Labor-based tax concessions	<p>Reductions in social security contributions</p> <p>Deductions from taxable earnings based on number of employees, other labor expenses</p> <p>Exemption from employee-based taxes</p>
Local value-added-based tax concessions	<p>Direct tax reductions/credits based on net local content of overseas production</p> <p>Income tax credits based on net value earned</p>
Other tax concessions	<p>Direct tax deductions based on other expenses (marketing, infrastructure, export promotion)</p> <p>Exemption/reduction in local levies, duties, and fees (including real estate taxes, municipal taxes, stamp duties)</p> <p>Reductions in corporate income tax based on sales</p> <p>Tax deduction for training</p>
Import-based concessions	<p>Exemption/reduction from import duties on capital goods</p> <p>Exemption/reduction from import duties on raw materials and other inputs</p> <p>Value-added tax (VAT) exemption/reduction, deferral for inputs/local supplies</p> <p>VAT exemption/reduction, deferral for capital good imports</p>
Export-based tax concessions based on output	<p>Exemption from export duties</p> <p>Preferential tax treatment of income from exports</p> <p>Income tax reduction for special foreign exchange earning activities or manufactured exports</p> <p>Tax credits on domestic sales in return for export performance</p>

TABLE 10.1 (Continued)

Type of incentive	Examples
Export-based tax concessions based on inputs	Duty drawback Tax credit for duties paid on imported materials or supplies Income tax credits on net local content of exports or local taxes paid Deductions of overseas expenditures and capital allowance for export industries VAT/excise reduction/exemption on exported inputs
<i>Financial</i>	
Government grants	Direct subsidies to cover capital costs Direct subsidies to cover production or marketing costs Direct subsidies for employment Reimbursement of employee salaries
Government credit at subsidized rates	Subsidized loans Loan guarantees Export credits/guarantees Loans for job creation
Government equity participation	Publicly funded equity participation
Government insurance at preferential rates	Coverage of rate volatility risk Coverage of rate devaluation risk Coverage of other risks Export credit insurance
<i>Other</i>	
Subsidized dedicated infrastructure	Subsidized land and buildings Other subsidized infrastructure Telecom Transport Electricity Water Other
Subsidized services	Assistance in identifying finance Assistance in implementing and managing projects Financing of preinvestment studies Market information Availability of infrastructure and raw materials Advice on production processes and marketing techniques

(continued on next page)

TABLE 10.1 (Continued)

Type of incentive	Examples
Subsidized services (continued)	Training and retraining assistance Technical facilities for developing know-how Technical facilities for improving quality control Better customs service Subsidization of employee hiring costs Export promotion assistance
Market preferences	Preferential government contracts Closing of further market entry Protection from import competition Granting of monopoly rights Limited local market access
Preferential treatment on foreign exchange	Special exchange rates Special foreign debt-equity conversion rates Elimination of foreign exchange risks on foreign exchange loans Concessions of foreign exchange credits for export earnings Special concessions on repatriation of earnings and capital Free foreign exchange management/transfer Foreign exchange release for domestic contribution to joint venture Permission to take foreign exchange loans
Miscellaneous concessions	Exemptions from or relaxation of labor laws and regulations Waiver/relaxation of time limitation for use of imported goods Tax exemption on share transfer to noncitizens Capital gains tax exemption on share transfer Tax relief on purchase of ordinary shares Work permit concessions Tax exemptions to foreign employees Tax exemption on foreign royalties

Source: Author's calculations.

Seventy-nine incentives were observed, taken both from the UNCTAD list and from the survey undertaken for the data collection exercise (table 10.1). These were classified into three categories:

- *Fiscal incentives:* These are incentives that offer tax concessions or concessions on other dues owed to the government. Reducing the tax liability increases the profitability and hence the rate of return for the investing firm. Fiscal incentives affect after-tax profitability, the flow of funds, and the cost of capital. Depending on the specific purpose for which the concession is given, these incentives were further classified as profit-based tax concessions, capital investment-based tax concessions, labor-based tax concessions, local value-added-based tax concessions, other tax concessions, import-based concessions, export-based tax concessions based on output, and export-based tax concessions based on inputs.
- *Financial incentives:* These are incentives in which there is a direct transfer or potential transfer of funds to the investing firm. They reduce the total investment cost of the firm and improve liquidity by reducing cash outflow for interest and other payments. There is a bias in such incentives toward capital-intensive projects. Financial incentives have been further classified as government grants, government credit at subsidized rates, government equity participation, and government insurance at preferential rates.
- *Other incentives:* These are incentives that are not easily classifiable under either of the other two categories but nevertheless affect investment decisions. Improved and inexpensive infrastructure, trade barriers to increase market protection, concessions on foreign exchange, and employment of foreigners are some common areas for incentives. These incentives have been further classified as subsidized dedicated infrastructure, subsidized services, market preferences,⁶ preferential treatment of foreign exchange, and miscellaneous concessions.⁷

While the types of incentives used and the composition of incentive packages vary from country to country, most countries use incentives to attract investments. Both of the two major surveys examined for this chapter—UNCTAD (1996) and UNCTAD (2000b)—document and confirm the widespread and increasing use of incentives in the world.⁸ Data collection was based on information provided by the Web sites of investment promotion agencies,⁹ complemented by information on transition economies compiled by Mah and Tamulaitis (2000) and the Country Commercial Guides issued by the U.S. Commercial Service and the U.S. Department of State.¹⁰

Information was collected for 91 WTO members, divided into 8 regional groups (table 10.2). The classification of incentives given in table 10.1 was used in compiling the database. If a country provided any of the incentives listed there, it was noted as a yes, regardless of the conditions attached to the incentives. If an incentive was not provided, this was noted as a no. The database therefore records only the use of an incentive, not its value.

TABLE 10.2 Countries and Economies Included in the Database

<i>Developed countries (20)</i>	<i>East and Southeast Asia (10)</i>	<i>Latin America (15)</i>
Australia	Brunei Darussalam	Argentina
Austria	China	Bolivia
Belgium	Hong Kong (China)	Brazil
Canada	Indonesia	Chile
Cyprus	Korea, Rep. of	Colombia
Denmark	Malaysia	Costa Rica
Finland	Philippines	Ecuador
France	Singapore	El Salvador
Germany	Taiwan (China)	Guyana
Greece	Thailand	Honduras
Iceland		Panama
Ireland	<i>Sub-Saharan Africa (18)</i>	Paraguay
Italy	Angola	Peru
Japan	Botswana	Uruguay
Netherlands	Cameroon	Venezuela, R. B. de
New Zealand	Côte d'Ivoire	
Spain	Gambia, The	<i>Middle East and North Africa (7)</i>
Switzerland	Ghana	Egypt, Arab Rep. of
United Kingdom	Kenya	Israel
United States	Malawi	Jordan
	Mali	Morocco
<i>Transition economies (10)</i>	Mozambique	Tunisia
Bulgaria	Namibia	Turkey
Czech Republic	Nigeria	United Arab Emirates
Hungary	Senegal	
Kyrgyz Republic	South Africa	<i>Small island economies (7)</i>
Latvia	Tanzania	Antigua and Barbuda
Mongolia	Uganda	Barbados
Poland	Zambia	Dominican Republic
Romania	Zimbabwe	Maldives
Slovak Republic		Mauritius
Slovenia	<i>South Asia (4)</i>	St. Lucia
	Bangladesh	Trinidad and Tobago
	India	
	Pakistan	
	Sri Lanka	

Source: Author's calculations.

Incentives do not occur in isolation. They come as packages, and it is the value of an incentive package that determines an investment decision. Incentives must also be seen in the context of the prevailing national tax and regulatory framework. A country with a very liberal investment and regulatory regime, a large market, and so on will require far fewer incentives than a country that is less open and has a far more restrictive business climate. The latter would need to provide more incentives, which may appear to be highly attractive but in reality merely neutralize the disadvantages imposed by a restrictive environment. This element is difficult to capture in the database.

10.3 The Pattern of Usage of Investment Incentives

Regional variation in the use of fiscal, financial, and other incentives in the 91 countries reviewed is given in tables 10.3, 10.4, and 10.5. The frequency of use of fiscal incentives ranges from 0 countries for some to 43 for others. The use of financial incentives ranges from 0 to 26, and the use of other incentives ranges from 0 to 24. Of the 71 incentives observed, 29 are used by at least 5 countries. Fewer than 5 countries use the remaining 42.

Fiscal incentives are the most prevalent (table 10.6). They account for 19 of the 29 most used incentives and the top 5 most popular incentives. Five financial incentives and 5 other incentives appear in the list of 29 most popular incentives. Tax exemptions and holidays, investment and reinvestment allowances, and exemption of capital goods imports from import duties are used by almost half the countries studied. Other frequently used fiscal incentives are lower direct tax rates, accelerated depreciation, value-added tax (VAT) exemption on capital goods, import duty exemption on raw materials, and duty drawbacks.

Among financial incentives, direct capital subsidies are used most frequently. Other financial incentives include subsidized loans, direct employment subsidies, export credits, credit guarantees, and loan guarantees. Among "other incentives," training and retraining assistance and special concessions on the repatriation of profits and capital are most widely used. Many countries also provide subsidized infrastructure, land, and buildings.

A wide range of incentives that could be deployed are only infrequently used, for reasons that are not entirely clear. Some incentives linked to export performance or local content may be unpopular because they are not consistent with WTO rules or other international commitments.¹¹ Other reasons for lack of use could be difficulty administering them, undesirable revenue implications, the availability of market instruments as alternatives, lack of effectiveness in attracting investment, and unique national circumstances that necessitate the use of specialized incentives.

TABLE 10.3 Use of Fiscal Investment Incentives, by Region

Incentive	Number of countries offering the incentive		
	Total (91)	Developed countries (20)	East and Southeast Asia (10)
<i>Profit-based tax concessions</i>			
Lower tax rate	33	1	4
Tax exemption/holiday	43	4	8 ^a
Loss write-off	13	0	1
Exemption from dividend/withholding tax	10	2	2
Exemption from minimum flat rate income tax	2	1	0
Complete exemption from taxes	1	0	0
<i>Capital investment-based tax concessions</i>			
Accelerated depreciation	27	6 ^a	4
Investment/reinvestment allowance	41	6 ^a	6 ^a
Exemption from capital tax	2	1	0
<i>Labor-based tax concessions</i>			
Social security reduction	9	4	0
Employee-based tax deductions	7	0	1
Employee tax exemptions	1	0	0
<i>Local value-added-based tax concessions</i>			
Tax credits on local content	1	0	1
Tax credits on net value earned	1	0	1
<i>Other tax concessions</i>			
Tax deductions on other expenses	10	1	4
Reduction in local, municipal taxes and duties	19	6 ^a	2
Tax reduction based on sales	2	0	0
Tax deduction for training	11	4	2
<i>Import-based concessions</i>			
Exemption of capital goods from import duties	41	1	6 ^a
Exemption of raw materials from import duties	22	1	4
VAT exemption for raw materials	18	1	2
VAT exemption for capital goods	24	0	3
<i>Export-based tax concessions based on output</i>			
Exemption on export duties	5	0	1
Preferential treatment of export income	14	0	1
Tax reduction for foreign exchange earned	2	0	1
Tax credits on domestic sales for exports	2	0	1

TABLE 10.3 (Continued)

Number of countries offering the incentive					
South Asia (4)	Middle East and North Africa (7)	Sub- Saharan Africa (18)	Latin America (15)	Small island economies (7)	Transition economies (10)
2 ^a	4 ^a	10 ^a	4	3	5
3 ^a	5 ^a	8 ^a	5	4 ^a	6
1	0	0	2	1	8 ^a
0	1	1	1	3	0
0	0	1	0	0	0
0	0	0	1	0	0
0	2	5	2	1	7
2 ^a	3	11 ^a	4	1	8 ^a
0	0	0	1	0	0
0	2	1	1	0	1
0	0	1	1	0	4
0	0	1	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
0	0	1	0	1	3
0	3	2	6 ^a	0	0
0	0	0	0	2	0
0	0	5	0	0	0
2 ^a	5 ^a	8 ^a	8 ^a	4 ^a	7
0	0	3	6 ^a	5 ^a	3
0	1	2	7 ^a	2	3
0	3	3	8 ^a	1	8 ^a
0	0	3	0	0	0
2 ^a	1	2	2	3	3
0	0	1	0	0	0
0	0	1	0	0	0

(continued on next page)

TABLE 10.3 (Continued)

Incentive	Number of countries offering the incentive		
	Total (91)	Developed countries (20)	East and Southeast Asia (10)
<i>Export-based tax concessions based on inputs</i>			
Duty drawback	18	1	3
Tax credit for duties paid on imports	2	0	0
Tax credits for local content of exports	2	0	1
Special tax deductions on export-related expenses	0	0	0
VAT exemption on exported imported permissible supplies	15	2	2

Regional Variations in the Use of Incentives

The use of incentives varies widely across regions (table 10.7). Figures 10.1–10.9 show regional patterns in the use of the 29 most popular incentives. Table 10.8 gives additional information on incentive packages of selected countries.

Developed countries. The use of incentives in developed countries is heavily tilted toward financial incentives (figure 10.2). Seventeen of the 20 countries reviewed provide direct subsidies to cover capital costs, 11 provide direct subsidies for employment, and 9 provide subsidized loans (table 10.4 and 10.7). The only other region that uses financial incentives on a comparable scale is Eastern Europe.

Fiscal incentives are used much less. Even here, the emphasis is not on direct tax concessions based on profits but on capital investment–based concessions, such as accelerated depreciation and investment and reinvestment allowances. Some countries use exemptions or reductions in local and municipal taxes and duties as an incentive (table 10.3). Eleven countries offer training and retraining assistance as an incentive. Provision of subsidized infrastructure is a relatively minor incentive, possibly because high-quality infrastructure is already available.

Various conditions accompany these incentives (table 10.8). In most countries, grants are given on a case-by-case basis. Grant-giving agencies have considerable discretion on the value of the incentive package to be given. The European Communities set caps and ceilings on the amount of cash grants that can be given. Grants can be general or for research and development, regional development, or

TABLE 10.3 (Continued)

Number of countries offering the incentive					
South Asia (4)	Middle East and North Africa (7)	Sub-Saharan Africa (18)	Latin America (15)	Small island economies (7)	Transition economies (10)
2 ^a	2	5	0	0	1
0	0	1	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
0	1	2	4	0	4

Source: Author's calculations.

Note: a. Incentive is one of the top three incentives used in the region.

small and medium-size enterprises.¹² In some countries regional governments and agencies also award grants.¹³

The extensive use in developed countries of subsidies, grants, and loans rather than tax concessions probably reflects both the availability of budgetary resources to support large grant programs and the desire to restrict fiscal incentives whose value can be indeterminate. Discretionary direct subsidies given on a case-by-case basis can also be effective and targeted instruments to swing investment decisions in favor of a country.

East and Southeast Asia. The focus in this region is on fiscal incentives and subsidized infrastructure. Tax holidays and exemptions, investment allowances, and reduction of import duties on capital goods are the most popular incentives. Few countries provide direct subsidies or subsidized loans. Provision of subsidized infrastructure is common.

Figure 10.3 shows the usage of the 29 most popular incentives. Incentives cluster around direct tax concessions based on profits or capital investment, duty reduction on capital goods imports and raw material imports, and subsidized infrastructure. The pattern of incentive use in this region is quite similar to that in Sub-Saharan Africa (figure 10.6), although East and Southeast Asia attract the most FDI among developing countries and Sub-Saharan Africa are at the bottom in FDI flows. This suggests that the availability of investment incentives is only

TABLE 10.4 Use of Financial Investment Incentives, by Region

Incentive	Total (91)	Developed countries (20)	East and Southeast Asia (10)
<i>Government grants</i>			
Direct capital subsidies	26	17 ^a	2 ^a
Direct production/marketing subsidies	2	0	0
Direct employment subsidies	18	11 ^a	0
Reimbursement of employee salaries	3	1	0
<i>Government credit at subsidized rates</i>			
Subsidized loans	22	9 ^a	2 ^a
Loan guarantees	9	4	0
Export credits/guarantees	13	4	0
Loans for job creation	1	0	0
<i>Government equity participation</i>			
Publicly funded equity participation	4	3	1
<i>Government insurance at preferential rates</i>			
Coverage of exchange rate volatility risk	0	0	0
Coverage of rate devaluation risk	0	0	0
Coverage of other risks	0	0	0
Export credit insurance	2	1	0

one factor in making an investment decision and that other factors make East and Southeast Asia attractive for FDI. Table 10.8 shows that incentives in this region target industry, particularly high-technology industry. In addition, countries in this region have extensive export-processing zone (EPZ) programs. These incentives could account for high FDI flows.

South Asia. The range of incentives in South Asia is narrow, with the few incentives that are offered being fiscal (figure 10.4).¹⁴ This may reflect lack of budgetary resources for offering direct subsidies. Special concessions offered for repatriation of profits and capital try to negate the effects of restrictive foreign exchange regimes.

Middle East and North Africa. The focus in this region is on fiscal incentives (figure 10.5). The pattern of fiscal incentives is similar to that in East and Southeast Asia. Financial incentives are almost absent. Surprisingly, subsidized infrastructure is not frequently used. While some incentives are given for regional development, Israel is the only country targeting specific high-technology industries.

Sub-Saharan Africa. This region uses a wide range of incentives (figure 10.6). Of the 18 countries reviewed, 11 provide investment allowances, 10 offer concessions in direct tax rates, and 8 give tax holidays or reductions on import duties for

TABLE 10.4 (Continued)

South Asia (4)	Middle East and North Africa (7)	Sub- Saharan Africa (18)	Latin America (15)	Small island economies (7)	Transition economies (10)
0	1	1	1	0	4
0	0	1	1	0	0
0	0	1	1	0	5 ^a
0	0	0	0	0	2
0	1	1	3 ^a	0	6 ^a
0	0	0	1	0	4
0	0	1	1	0	7 ^a
0	0	0	0	0	1
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	1	0

Source: Author's calculations.

Note: a. Incentive is one of the top three incentives used in the region.

imports of capital goods. Financial incentives are almost absent, reflecting tight budgetary conditions. Other incentives are sparsely used.

The range and pattern of incentives offered in this region are similar to those in two other regions—East and Southeast Asia and Latin America—which are far more successful in attracting FDI (table 10.8). Unlike in those regions, however, there seems to be almost no targeting of sectors. The reasons for this difference need to be probed, because a common complaint in this region is that the liberalization of investment regimes has not led to the expected increase in FDI flows, demonstrating that investment incentives are only one factor in a larger set of determinants of FDI flows.¹⁵

Latin America. Import duties and VAT reductions and exemptions are the preferred incentive in Latin America and the Caribbean (figure 10.7 and table 10.8). Direct tax concessions through lower tax rates, tax holidays, investment allowances, and accelerated depreciation are also used. Except for a few instances of subsidized loans, direct subsidization is low. There are many concessions on foreign exchange. Much emphasis is placed on export industries. Some regional development incentives are also offered.

TABLE 10.5 Use of Other Investment Incentives

Incentive	Total (91)	Developed countries (20)	East and Southeast Asia (10)
<i>Subsidized dedicated infrastructure</i>			
Subsidized land and buildings	14	4 ^a	2 ^a
Other subsidized infrastructure	14	3 ^a	5 ^a
<i>Subsidized services</i>			
Assistance in identifying finance	2	2	0
Project management assistance	1	1	0
Financing of preinvestment studies	3	1	0
Market information	3	1	0
Infrastructure and raw materials advice	3	2	0
Technical advice	0	0	0
Training and retraining assistance	24	11 ^a	0
Technical facilities for developing know-how	0	0	0
Quality control facilities	0	0	0
Better customs service	1	0	0
Subsidization of employee hiring costs	1	0	0
Export promotion assistance	1	0	0
<i>Market preferences</i>			
Preferential government contracts	2	0	0
Closing of further market entry	4	0	0
Protection from import competition	1	0	0
Granting of monopoly rights	2	0	0
Limited local market access	1	0	0
<i>Preferential treatment on foreign exchange</i>			
Special exchange rates	0	0	0
Special foreign debt-equity conversion rates	0	0	0
Elimination of foreign exchange risks on foreign exchange loans	1	0	0
Concessional foreign exchange credits for export earnings	1	0	0
Special concessions on repatriation	23	0	0
Free foreign exchange management/transfer	7	0	1
Foreign exchange release for local share of joint ventures	0	0	0
Permission to take foreign exchange loans	1	0	0

TABLE 10.5 (Continued)

South Asia (4)	Middle East and North Africa (7)	Sub-Saharan Africa (18)	Latin America (15)	Small island economies (7)	Transition economies (10)
0	0	0	1	2 ^a	5 ^a
0	0	0	3 ^a	0	3 ^a
0	0	0	0	0	0
0	0	0	0	0	0
0	0	1	1	0	0
0	1	0	0	1	0
0	1	0	0	0	0
0	0	0	0	0	0
0	2 ^a	1	2 ^a	3 ^a	5 ^a
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	1	0
0	0	0	0	0	1
0	0	0	0	1	0
0	0	0	0	0	2
0	0	0	1	0	3 ^a
0	0	0	1	0	0
0	0	0	0	0	0
0	0	0	0	0	2
0	0	0	1	0	0
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	1	0	0
0	0	1	0	0	0
2 ^a	3 ^a	4 ^a	7 ^a	5 ^a	2
1	0	2 ^a	2 ^a	2	0
0	0	0	0	0	0
0	0	1	0	0	0

Source: Author's calculations.

Note: a. Incentive is one of the top three incentives used in the region.

TABLE 10.6 Most Frequently Used Investment Incentives, by Region

Incentive	Total (91)	Developed countries (20)	East and Southeast Asia (10)
Tax exemption/holiday	43	4	8
Investment/reinvestment allowance	41	6	6
Exemption of capital goods from import duties	41	1	6
Lower tax rate	33	1	4
Accelerated depreciation	27	6	4
Direct capital subsidies	26	17	2
VAT exemption for capital goods	24	0	3
Training and retraining assistance	24	11	0
Special concessions on repatriation of foreign exchange	23	0	0
Raw material import duties exempted	22	1	4
Subsidized loans	22	9	2
Reduction in local, municipal taxes/duties	19	6	2
Exemption of raw materials from import duties	18	1	2
Duty drawback	18	1	3
Direct employment subsidies	18	11	0
VAT exemption on exported imported permissible supplies	15	2	2
Preferential treatment of export income	14	0	1
Subsidized land and buildings	14	4	2
Other subsidized infrastructure	14	3	5
Loss write-off	13	0	1
Export credits/guarantees	13	4	0
Tax deduction for training	11	4	2
Exemption from dividend/withholding tax	10	2	2
Tax deductions on other expenses	10	1	4
Social security reduction	9	4	0
Loan guarantees	9	4	0
Employee-based tax deductions	7	0	1
Free foreign exchange management/transfer	7	0	0
Export duty exemption	5	0	1

Small island economies. Most small island economies have few natural resources. Their industrial development policies focus on making them attractive investment destinations. Because of their small size, they are not in a position to provide financial incentives, which are completely absent. Their incentive system revolves around low

TABLE 10.6 (Continued)

South Asia (4)	Middle East and North Africa (7)	Sub- Saharan Africa (18)	Latin America (15)	Small island economies (7)	Transition economies (10)
3	5	8	5	4	6
2	3	11	4	1	8
2	5	8	8	4	7
2	4	10	4	3	5
0	2	5	2	1	7
0	1	1	1	0	4
0	3	3	6	1	8
0	2	1	2	3	5
2	3	4	7	5	2
0	0	3	6	5	3
0	1	1	3	0	6
0	3	2	6	0	0
0	1	2	7	2	3
2	2	5	4	0	1
0	0	1	1	0	5
0	1	2	4	0	4
2	1	2	2	3	3
0	0	0	1	2	5
0	0	0	3	0	3
1	0	0	2	1	8
0	0	1	1	0	7
0	0	5	0	0	0
0	1	1	1	3	0
0	0	1	0	1	3
0	2	1	1	0	1
0	0	0	1	0	4
0	0	1	1	0	4
1	0	2	2	2	0
0	0	3	1	0	0

Source: Author's calculations.

direct and indirect tax rates and easy foreign exchange transactions, which make these countries attractive manufacturing centers (figure 10.8). In fact, there is no distinction in many of these countries between EPZs and incentives offered for investments.

TABLE 10.7 Top Three Fiscal, Financial, and Other Investment Incentives Used, by Region

Type of incentive	Developed countries (20)	East and Southeast Asia (10)	South Asia (4)	Middle East and North Africa (7)
<i>Fiscal</i>				
1	Accelerated depreciation (6)	Tax holidays/exemptions (8)	Tax holidays/exemptions (3)	Tax holidays/exemptions (5)
2	Investment/reinvestment allowance (6)	Investment/reinvestment allowance (6)	Concessionary income tax rate (2)	Reduction in import duties on capital goods (5)
3	Concessions in local taxes, including real estate and municipal taxes (6)	Reduction in import duties on capital goods (6)	Investment/reinvestment allowance (2) Reduction in import duties on capital goods (2) Preferential tax treatment for export income (2) Duty drawbacks (2)	Concessionary income tax rate (4)
<i>Financial</i>				
1	Direct subsidies to cover capital costs (17)	Direct subsidies to cover capital costs (2)		
2	Direct subsidies for employment (11)	Subsidized loans (2)		
3	Subsidized loans (9)			
<i>Other</i>				
1	Training and retraining assistance (11)	Other subsidized infrastructure (5)	Special concessions on foreign exchange repatriation (2)	Special concessions on foreign exchange repatriation (3)
2	Subsidized land and buildings (4)	Subsidized land and buildings (2)		Training and retraining assistance (2)
3	Other subsidized infrastructure (3)			

TABLE 10.7 (Continued)

Sub-Saharan Africa (18)	Latin America (15)	Small island economies (7)	Transition economies (10)
Investment/reinvestment allowance (11) Concessionary income tax rate (10)	Reduction in import duties on capital goods (8) VAT reduction for inputs/local supplies (7)	Reduction in import duties on raw materials (5) Tax holidays/exemptions (4)	Write-off for holiday period losses (8) Investment/reinvestment allowance (8)
Tax holidays/exemptions (8)	Concessions in local taxes, including real estate and municipal taxes (6) Reduction in import duties on capital goods (6) VAT reduction for capital goods imports (6)	Reduction in import duties on capital goods (4)	VAT reduction for capital goods imports (8)
	Subsidized loans (3)		Export credits/guarantees (7) Subsidized loans (6) Direct subsidies for employment (5)
Special concessions on foreign exchange repatriation (4)	Special concessions on foreign exchange repatriation (7)	Special concessions on foreign exchange repatriation (5)	Subsidized land and buildings (5)
Free foreign exchange management (2)	Subsidized other infrastructure (3) Training and retraining assistance (2) Free foreign exchange management (2)	Training and retraining assistance (3) Subsidized land and buildings (2)	Training and retraining assistance (5) Other subsidized infrastructure (3) Closing of further market entry (3)

Source: Author's calculations.

Figure 10.1 Use of Investment Incentives, All Countries

Source: Author's calculations.

Eastern Europe. Countries in this region use both fiscal and financial incentives (figure 10.9). Like developing countries, the transition economies in this region use fiscal incentives, such as direct and indirect tax reductions and holidays, accelerated depreciation, investment allowances, and exemptions. Like developed countries, they also frequently use financial incentives, such as direct capital and employment subsidies, subsidized loans, and export credits and guarantees. Three countries in the region restrict market entry (table 10.5).

Summing up, the landscape of investment incentives is a richly textured one, with variations in many dimensions. Almost all countries use incentives to attract investment. However, more than 60 percent of all incentives are used by only a small number of countries (42 incentives are used by fewer than five countries each). This suggests that an approach toward negotiating future disciplines on the use of incentives could employ a gradual, sequential approach to restricting incentives, starting with the less widely used incentives. Disciplines could then be gradually expanded to include the more popular ones.

Figure 10.2 Use of Investment Incentives, Developed Countries

Source: Author's calculations.

Fiscal incentives are the most frequently used, especially in developing countries, possibly because of resource constraints in offering financial incentives. Developed countries tend to use financial incentives more extensively, perhaps reflecting their ability to shoulder the financial burden. These incentives are targeted and discretionary, and they are often finalized through negotiations, suggesting coherence between incentives and specific policy goals. Even when fiscal incentives are given, developed countries focus on investment-based tax concessions rather than indeterminate profit or indirect tax concessions. They also offer supply-side concessions, such as training assistance.

The patterns of usage suggest that in any future negotiations, developing countries could seek disciplines on financial incentives, as this is an area in which they can benefit most. They cannot compete with developed countries on the value of incentives, and without any regulation, they can lose out in the long run.

Figure 10.3 Use of Investment Incentives, East and Southeast Asia

Source: Author's calculations.

Among developing countries, East and Southeast Asia have the most clearly targeted incentive policy. Other regions, particularly Sub-Saharan Africa, offer a similar pattern of incentives. The similarity in incentive patterns is not reflected in FDI flows, suggesting that incentives represent only one factor influencing foreign investment. This could form a useful starting point in generating discussion on the need to reduce incentive competition among countries.

10.4 WTO Rules and Investment Incentives

There is no comprehensive treatment of investment issues in the WTO agreement. Therefore, there are no directly applicable WTO disciplines on investment incentives. However, some WTO agreements have provisions on incentives. These include the Agreement on Subsidies and Countervailing Measures (ASCM), the Agreement on Trade-Related Investment Measures (TRIMs), and the General Agreement on Trade in Services (GATS).

Figure 10.4 Use of Investment Incentives, South Asia

Source: Author's calculations.

10.4.1 Agreement on Subsidies and Countervailing Measures

The ASCM imposes disciplines on the use of subsidies and provides mechanisms for remedial action against injurious subsidies. Many investment incentives can be categorized as subsidies.

The ASCM reflects concern that export subsidies distort trade. Export subsidies can affect trade in three ways: by enhancing exports from the subsidizing country to an affected country, by enhancing exports from the subsidizing country to a third country, and by restraining imports of goods from the affected country into the subsidizing country.¹⁶ The affected country can legitimately claim that its trade has been adversely affected as a result of such export subsidies. At the same time, domestic subsidies are also a legitimate tool of government policy. Many subsidies are targeted at industrial or regional development and can be

Figure 10.5 Use of Investment Incentives, Middle East and North Africa

Source: Author’s calculations.

justified as acts of a sovereign government to meet valid policy goals. Therefore, it would be improper to categorize all subsidies as “bad” per se. The ASCM takes a mixed approach toward this issue, balancing the need to restrain the use of trade-distorting subsidies with the need to let countries use subsidies as a policy tool.¹⁷

The ASCM defines what a subsidy is and then applies the concept of “specificity” to determine whether the disciplines of the ASCM are applicable to the subsidy in question.¹⁸ To be covered by the agreement, a measure must be shown to be a specific subsidy. Subsidies covered by the agreement fall into three categories: prohibited, nonactionable, and actionable.

Table 10.9 gives a breakdown of the ASCM’s substantive rules for determining the category to which a subsidy belongs. This hierarchical framework expands the logical basis underlying the ASCM in categorizing subsidies. The articles in the agreement have been disaggregated into groups and subgroups, each of which addresses a specific issue.

Figure 10.6 Use of Investment Incentives, Sub-Saharan Africa

Source: Author's calculations.

Subsidies are defined in the agreement as having two features: a financial contribution from the government¹⁹ and a benefit conferred on the receiving party.²⁰ Both conditions have to be met for a measure to qualify as a subsidy.²¹

No subsidy is subject to the provisions of the ASCM unless it is specific—that is, access to it is limited. Specificity can be by enterprise, industry, or region. Any subsidy that is general in nature; applicable horizontally to all firms, sectors, and regions; based on objective criteria with automatic eligibility; or adhered to strictly is not considered specific.

The ASCM applies both a *de jure* and a *de facto* standard to determine specificity. A measure that has the objective of targeting a sector or region is *de jure* specific.²² A measure that appears neutral on the face but that may be targeted in practice is *de facto* specific. *De facto* specificity is an important test, as many measures appear neutral in design but predominantly benefit a few firms or are used in a discretionary way to focus on a few firms. The extent of diversification of economic activities will have to be taken into consideration to determine *de facto* specificity. This is

Figure 10.7 Use of Investment Incentives, Latin America

Source: Author's calculations.

important for developing countries whose economic activity is concentrated in a few sectors, as the benefits of any general subsidy would necessarily flow only to these sectors. A generally applicable tax set by any level of government is not specific.²³

Export subsidies and local content subsidies requiring the use of domestic goods are prohibited under the ASCM. Annex I of the ASCM includes an illustrative list of prohibited subsidies. Items (a)–(k) are prohibited export subsidies.²⁴ Direct subsidies or subsidized services contingent on exports or for export production; all exemptions, remissions, deferral of direct taxes, social security contributions, and deductions related to exports; all exemptions, remissions, and deferral of indirect taxes (or duty drawbacks) for exports in excess of those levied for domestic consumption (or on imported inputs); and subsidized export financing programs are treated as prohibited export subsidies (table 10.9). Nonactionable subsidies consisted of R&D, disadvantaged region, and environmental adjustment subsidies. However, this provision applied for only five years and as it was not renewed lapsed in 2000. Hence there is currently no nonactionable category of subsidies.²⁵

Figure 10.8 Use of Investment Incentives, Small Island Economies

Source: Author's calculations.

All specific subsidies that are not prohibited are actionable. Actionability implies that an affected member can initiate proceedings for imposing countervailing duties against such subsidies. In order to take action, an affected member has to demonstrate adverse effects of the subsidy, through injury to the domestic industry, nullification or impairment of benefits, or serious prejudice to the member's interests. If any of these effects is demonstrated, an affected member can impose countervailing duties according to the prescribed procedure.

There is some relaxation in these disciplines for developing countries. For least developed countries (LDCs) and developing countries with per capita income of less than \$1,000 a year (listed in Annex VII of the ASCM), export subsidies are not prohibited. For other developing countries, they were actionable for eight years until January 1, 2003, after which they became prohibited, subject to a standstill on the prevailing level of subsidies.²⁶ Local content subsidies became prohibited for

Figure 10.9 Use of Investment Incentives, Transition Economies

Source: Author's calculations.

LDCs on January 1, 2003, and for other developing countries on January 1, 2000. There are also some procedural concessions for developing countries, including a higher *de minimis* level (based on either subsidization or import share) for excluding their exports from any countervailing action. There was a similar seven-year relaxation (until January 1, 2002) on prohibited subsidies for transition economies.

The ASCM does not directly refer to investment incentives. Where these incentives come within the scope of the agreement, they are subject to its provisions. In practice, most investment incentives fall in the actionable category. With the lapsing of the nonactionable category, all regional development subsidies and incentives will also be actionable. However, actionability is not the same as a prohibition and requires demonstration of adverse effects. While this is easy for export subsidies, the link between an investment-related subsidy and adverse effects is more difficult to establish. It would be far easier to establish a list of prohibited investment incentives.

The ASCM applies to subsidies provided by all levels of government. Investment incentives in many countries are provided by subnational governments, which fall within the scope of the ASCM.

10.4.2 Agreement on Trade-Related-Investment Measures

The TRIMs Agreement covers only a few measures that violate national treatment or the General Agreement on Tariffs and Trade (GATT) prohibition on quantitative restrictions provisions. It specifically prohibits measures requiring the use of products of domestic origin for obtaining an advantage (local content rule), measures restricting the use of imported products to the amount of exported local products (import-export balancing rule), and measures restricting the use of foreign exchange for imports to the amount of foreign exchange earned through exports (a foreign exchange balancing rule). As all three measures prohibited by the TRIMs are also violations of the GATT, the TRIMs Agreement does not add any new disciplines on investment incentives.²⁷ The TRIMs Agreement does not cover export performance requirements, although these could be covered under prohibited subsidies of the ASCM.

10.4.3 The General Agreement on Trade in Services

One of the modes of delivery of services under the GATS is through commercial presence (Mode 3). Commercial presence requires FDI, so the GATS has some bearing on investment. The types of investment incentives that are the subject of this chapter are not covered by GATS provisions, as they relate to manufacturing. However, if a member has made specific commitments in wholesale distribution and services, any investment incentive may need to be examined to determine whether it violates the GATS disciplines on most favored nation (MFN) and national treatment.

10.5 Consistency of Existing Incentive Programs with WTO Rules

To determine the consistency of a measure with WTO rules, each incentive must be examined in its entirety. Most incentives are provided only if a wide range of conditions is met. These conditions may be the cause of inconsistency with WTO rules. Most incentives are in the form of a financial contribution from the government and provide a benefit to the recipient. Therefore, they can be categorized as subsidies under the ASCM. However, the other key element to be satisfied is specificity, which depends on the manner in which the incentives are provided. The provisions of any incentive that affect specificity are as follows:

TABLE 10.8 Selected Features of National Investment Incentive Packages

Country	Incentive
<i>Developed countries</i>	
Australia	Grants, tax relief, and infrastructure finance granted on case-by-case basis
Austria	Cash grants have overall ceilings
Belgium	Cash grants have overall ceilings
Canada	Range of federal and regional credit and aid programs, R&D tax credits
Denmark	Grants for regional development; ceilings on total grants; R&D grants
Finland	Grants for regional development and SMEs (less than €40 million), R&D grants; ceilings on grants
France	Grants for regional development; ceilings on total grants
Germany	Grants for regional development ceiling of 35% on grants
Iceland	Almost no incentives
Ireland	R&D grants
Italy	Regional variations; grants of up to 65% of investment; EC JEV program provides export incentives
Japan	National and regional grants
Netherlands	R&D grants; regional incentives
New Zealand	Strategic reserve fund to direct grants to specific firms; local bodies give exemptions
Spain	Regional grants of up to 50% of investment; R&D incentives
United Kingdom	R&D tax incentives; regional incentives
United States	No federal incentive program; many state-level incentives
<i>East Asia and Southeast Asia</i>	
China	Some incentives are regional
Hong Kong (China)	Few incentives; low tax rates overall
Korea, Rep. of	High-technology focus
Malaysia	Focus on high-technology and targeted sectors; many concessions linked to exports; other incentives linked to R&D
Philippines	Some incentives for regional development; tax credit given for local taxes paid on local capital goods that could have been imported
Singapore	Focus on target industries; investment allowance linked to tax-free dividends
Taiwan (China)	Some incentives for target industries, some for regional development
Thailand	Cap on tax holiday at 100%; some incentives are regional

TABLE 10.8 (Continued)

Country	Incentive
<i>South Asia</i>	
Pakistan	Incentives based on exports or export industries; some incentives are regional
<i>Middle East and North Africa</i>	
Egypt, Arab Rep. of	Some regional variation in tax holidays
Israel	Grants are percentage of costs; additional incentives for R&D
Tunisia	Tax reduction for exporting industries; some regional and employment incentives
Turkey	Incentives are regional or export based; no separate regime for FDI; VAT repaid for local machinery purchases
United Arab Emirates	No separate incentives for investment
<i>Sub-Saharan Africa</i>	
Angola	Few incentives
Botswana	Almost no incentives; sells itself as good destination with low tax rate
Gambia, The	No investment incentives
Nigeria	Tax incentives for export projects; some regional incentives
Uganda	Simple tax regime; few incentives
Zimbabwe	Lower tax rates for exports
<i>Latin America</i>	
Argentina	No official incentive program; automobile investments protected by entry barriers
Brazil	Most incentives are regional
Chile	No FDI incentives; most incentives are regional, some are for exports
Colombia	Some incentives are regional, many are for exports
Ecuador	Few incentives; no specific FDI incentives; mainly export incentives; no income tax since 1999
El Salvador	Incentives mainly for exports
Guyana	Most incentives are for exports and special investments
Honduras	Incentives mainly for exports
Paraguay	Incentives available to all
Peru	Some incentives are for regional development, some for exports
Uruguay	No focus on exports
Venezuela, R. B. de	Incentives mainly for export

(continued on next page)

TABLE 10.8 (Continued)

Country	Incentive
<i>Small island economies</i>	
Barbados	International business companies, United States FSCs, offshore banks are not eligible for incentives
Dominican Republic	No special FDI incentives other than EPZs
Maldives	Few incentives
Mauritius	Simple but effective incentives
<i>Transition economies</i>	
Bulgaria	Some incentives are regional; interest subsidy is treated as subsidized loan
Czech Republic	VAT/import duty exemption for limited number of inputs
Hungary	Some incentives are regional
Latvia	Some tax incentives are regional
Mongolia	Few incentives
Poland	Some incentives are regional; some tax incentives are linked to exports

Source: Author's calculations.

Note: FSCs = foreign sales corporations; JEV = Joint European Venture; SMEs = small and medium enterprises.

- If the investment incentive is not given horizontally to all investments and is provided preferentially to FDI only or provided in a discretionary manner to a few firms, then specificity exists. To avoid specificity, an incentive should meet the objective criteria standard under the ASCM.
- If the investment incentive is a general direct tax concession giving a direct tax break to all firms without targeting any sector or firm and which meets the objective criteria standard, it is not specific.
- If an investment incentive is given for location in a specific geographical region, it is specific.
- If an investment incentive is contingent on export performance or local content, it becomes a prohibited subsidy and is consequently specific.

All specific subsidies are actionable by an affected member. When an incentive is contingent on export performance or local content, it is prohibited and cannot be maintained, according to WTO rules. If an incentive is accompanied by conditions requiring the use of domestic products over imported products or has a balancing requirement, such an incentive would be prohibited under the TRIMs Agreement.²⁸ In addition, if an incentive in the form of a tax or import duty

TABLE 10.9 Hierarchy of Rules for Determining whether Incentives Constitute a Subsidy under ASCM

ASCM article	Issue in question or measure	Box level	Logic for conclusion
1	IS IT A SUBSIDY?		
1.1(a)(1)	Financial contribution	A	I is (A OR B) AND C is a OR b OR (c NOT d) OR (e NOT f) OR g
1.1(a)(1)(i)	- Direct transfer of funds	a	
1.1(a)(1)(i)	- Potential direct transfer of funds	b	
1.1(a)(1)(ii)	- Forgone revenue (revenue otherwise due)	c	
Footnote 1	- Exemption / remission (not in excess) of exported product from taxes / duties borne by like product consumed domestically	d	
1.1(a)(1)(iii)	- Govt provision/purchase of goods/services	e	
1.1(a)(1)(iii)	- Govt provision of general infrastructure	f	
1.1(a)(1)(iv)	- (i) to (iii) above done through a private body under govt direction or funding	g	
1.1(a)(2)	Income or price support	B	
1.1(b)	Benefit conferred	C	including 1,2,3,4
14(a)	Government provision of equity inconsistent with usual private practice	1	
14(b)	Subsidized loan at rate lower than commercial rate for firm	2	
14(c)	Loan guarantee causing reduction in amount firm has to pay on loan	3	
14(d)	Provision of goods/services for less than adequate remuneration	4	
2	IS IT SPECIFIC?		
1.2, 2.1	How is it specific?		II is D (NOT E) OR F OR (G NOT H) OR III
2.1(a)	Legislation limits access to a subsidy to certain enterprises	D	
2.1(b)	No specificity if subsidy granted on certain basis	E	
2.1(b)	Subsidy based on objective criteria governing eligibility	h	is h AND i AND j AND k is 1 AND 2 AND 3 AND 4
2.1(b)	- criteria which are neutral	1	
2.1(b)	- do not favor certain enterprises over others	2	
2.1(b)	- economic in nature	3	
2.1(b)	- horizontal in application	4	
2.1(b)	Eligibility is automatic	i	
2.1(b)	Criteria adhered to strictly	j	
2.1(b)	Clearly spell out in law, regulation, or document	k	

(continued on the next page)

TABLE 10.9 (Continued)

ASCM article	Issue in question or measure	Box level	Logic for conclusion
2.1(c)	Application of subsidy appears nonspecific	F	A combination of l, m, n, o, p
2.1(c)	- use by limited number of enterprises	l	
2.1(c)	- predominant use by certain enterprises	m	
2.1(c)	- granting of disproportionate amounts to certain firms	n	
2.1(c)	- manner of exercise of discretion by granting authority	o	
2.1(c)	- low level of diversification of economy	p	
2.2	Subsidy limited to designated geographical region within jurisdiction	G	H
2.2	Generally applicable tax set by a government	H	
2.3	Subsidy is a prohibited subsidy under Art. 3	I	
3	IS IT A PROHIBITED SUBSIDY?		III is J OR K is q OR (r NOT s)
3.1(a)	Export subsidy	J	
3.1(a)	- contingent on export	q	
3.1(a)	- covered in annex I	r	
Footnote 5	- excluded by annex I	s	
3.1 (b)	Domestic content subsidy	K	
5	IS IT AN ACTIONABLE SUBSIDY?		IV is L OR M OR N NOT P
5(a)	Injury to domestic industry	L	
5(b)	Nullification or impairment of benefits particularly GATT II concessions	M	is t OR u OR v OR w NOT x
5(c)	Serious prejudice to interests	N	
6.3(a)	- effect is to displace/impede imports into subsidizing country	t	
6.3(b)	- effect is to displace/impede exports from III country	u	
6.3(c)	- significant price undercutting/suppression/depression, lost sales	v	
6.3(d)	- increase in world market share in a consistent trend	w	
6.7	No serious prejudice shall arise in some circumstances	x	
6.1	Serious prejudice deemed to exist if		
6.1(a)	- ad valorem subsidization > 5%	1	
Annex IV.4	- for start-ups, if subsidization > 15% of investment	2	
6.1(b)	- subsidy covers operating losses of industry	3	
6.1(c)	- subsidy covers operating losses of firm other than one-time measures	4	
6.1(d)	- direct forgiveness of debt and grants to cover debt repayment	5	
6.1, 27.8	No presumption of serious prejudice under 6.1 for developing countries	6	
11.9	Subsidy is de minimis (< 1% ad valorem)	P	1 OR 2 OR 3 OR 4 OR 5 NOT 6 Article 6.1 has lapsed now Presumption of serious prejudice is not there anymore

TABLE 10.9 (Continued)

ASCM article	Issue in question or measure		Box level	Logic for conclusion
8	IS IT NONACTIONABLE?			is 1 OR 2 OR 3 OR 4
	8.1(a)	Nonactionable if nonspecific	1	This provision has lapsed No non-actionable subsidy is there now
	8.2(a)	- for specified research activities	2	
	8.2(b)	- specified assistance to disadvantaged regions	3	
	8.2(c)	- assistance to industry to adapt to environmental requirements	4	
Annex I	IS IT LISTED IN ANNEX I?		V	Any one of 1 to 12 except 9 AND 13
	a	- Direct subsidy contingent on export performance	1	
	b	- Currency retention schemes involving bonus on exports	2	
	c	- Subsidized transport on export shipments	3	
	d	- Provision of products/services for export production more favorable than for domestic consumption production and more favorable than what is commercially available globally	4	
	e	- Exemption, remission, or deferral of direct taxes or social welfare charges payable and related to exports	5	
	f	- Special deductions related to exports for direct tax charges	6	
	g	- Exemption, remission of indirect taxes for exports in excess of those levied for domestic consumption	7	
	h	- Exemption, remission, or deferral of prior-stage cumulative indirect taxes on inputs for exports in excess of similar benefit given for inputs for domestic consumption	8	
	h	- Prior-stage cumulative taxes may be exempted, remitted, or deferred for final exported products even when not exempted for domestic products if they have been levied on inputs	9	
	i	- Drawbacks, remissions of import charges in excess of those collected or levied on imported inputs	10	
	j	- Subsidized provision of export credit guarantee or insurance programs, of insurance/guarantee programs against cost revisions or exchange risks	11	
	k	- Grant of export credits at lower than commercial rates or payment of credit obtaining costs	12	
	k	- Grant of export credits as per international norms	13	

(continued on the next page)

TABLE 10.9 (Continued)

ASCM article	Issue in question or measure		Box level	Logic for conclusion
27	PROVISIONS FOR DEVELOPING COUNTRIES			
27.2	Prohibition on export subsidies not applicable - (only actionable)			
27.2(a)	- at all for countries listed in annex VII			
27.2(b)	- for 8 years for other developing countries, if 27.4 conditions are met			
27.4	Standstill and phase out obligation for developing countries covered under 27.2(b) waiving prohibition on export subsidies			
27.5, 27.6	Check whether export competitiveness in a product has been reached—phase out changes and becomes faster			
27.3	Prohibition on domestic content subsidies waived			
27.3	- by 5 years for developing countries			
27.3	- by 8 years for LDCs			
5	IS IT AN ACTIONABLE SUBSIDY? (for DEVELOPING COUNTRIES)			V
27.8	Art. 6.1 subsidies, demonstrate existence of serious prejudice in accordance with Arts. 6.3–6.8		N	
27.9	Other subsidies actionable only on nullification/impairment of concessions under GATT in such a way as to displace/impede imports into market of subsidizing country or injury to domestic industry of importing member occurs		Q	is t OR u OR v OR w NOT x is L OR M (based on t) OR N NOT R
27.10	De minimis is subsidy < 2% ad valorem or < 4% of imports by volume in importing member unless total of such countries > 9%		R	

Source: Author's calculations.

Note: GATT = General Agreement on Tariffs and Trade.

concession is not given on an MFN basis, it may violate GATT Article I MFN provisions.²⁹ For developing countries the relaxations under the ASCM apply. For developing countries and LDCs, prohibited export subsidies are actionable only.³⁰ Local content subsidies are not currently prohibited for LDCs but are prohibited for other developing countries.

10.5.1 Fiscal Incentives

All fiscal incentives provide a financial contribution in the form of forgone revenue. They also provide a benefit to the firm receiving the concession. Therefore,

the conditions for being a subsidy are satisfied. Whether these subsidies are specific or prohibited depends on the form they take.

Profit-based tax concessions. Specificity of profit-based tax concessions depends on the imposition of any regional location conditions or the discretionary grant of concessions to FDI. Normally, these provisions are part of the tax laws. If they treat all investments identically, they would not be specific. Exemptions from (or reductions in) withholding taxes, dividend taxes, and flat-rate income taxes are normally available only to specific investments or target export industries and are hence specific. If the concessions are tied to export performance or local content, they are prohibited.

Capital investment-based tax concessions. Investment and reinvestment allowances are normally part of tax laws and are general tax provisions applicable to all firms. They would therefore lack specificity and hence not be actionable. Accelerated depreciation is often given only to certain sectors or investments. In this case, it is a specific concession and is actionable. In cases in which it is linked to export performance or local content, it is a prohibited subsidy.³¹ Such a concession may also violate GATT MFN rules if it is provided to capital goods brought in from certain countries and not from others. Similar arguments would apply to exemptions from capital taxes.

Labor-based tax concessions. Reductions in social security contributions given to certain sectors or investments are specific concessions and are actionable. Linked to export performance or local content, they become prohibited subsidies. Deductions from taxable earnings based on number of employees or other labor expenditure is normally given as a general tax concession and hence is unlikely to be specific. If the deduction is only on the basis of number of employees, TRIMs, GATT, and GATS violations are also unlikely. Exemptions from employee-based taxes are like reductions in social security contributions and will be specific and actionable if they are given only to FDI or to specific sectors. If they are based only on the number of employees (which is unlikely, as that would negate the purpose of the tax itself), they would not be specific.

Local value-added-based tax concessions. A direct tax reduction or credit based on net local content of output is a violation of the TRIMs Agreement, as it is a prohibited local content rule. It also violates GATT Articles III and XI. GATS violations may also occur if there are corresponding commitments in distribution or wholesaling. As a domestic content subsidy, it is a prohibited subsidy under the ASCM. A similar credit or deduction based on net value earned is different, as it is not directly based on local content. As a general tax rule, it is not likely to be specific, and a violation of the TRIMs Agreement would arise only if imported and domestic inputs are treated differently for calculating value earned.

Other tax concessions. Direct tax deductions based on other expenditures are normally general tax rules applicable to all firms and hence not specific or actionable. The only exception is any additional deduction given for export promotion expenditure. Such a deduction is a prohibited subsidy. Exemption from local taxes and duties is often given on a case-by-case negotiated basis to specific investments or to specific sectors. They are likely to be specific and actionable. If they target export industries, they are prohibited subsidies. Often these exemptions are given by subnational governments and are difficult to detect. They are not even notified as a subsidy to the WTO. Tax reductions based on sales are similar in effect, and the same arguments apply. Tax deduction for training is a general tax concession and is rarely specific, unless provided only to certain sectors.

Import-based concessions. Exemption from import duties and VAT on capital goods is likely to be given to a few sectors or investments. Therefore, these concessions are likely to be specific and actionable. They will not be specific only if there is a blanket exemption for all capital goods. The same specificity arguments apply to exemptions from import duties on raw materials, as this would also be focused on a few firms.³² If the exemption extends to all raw material used by a firm and only a portion of the firm's output is exported, it would be a prohibited subsidy, as the remission of duty is in excess of that levied on imported inputs used in export production. If the concession is not given on an MFN basis, it may also violate GATT MFN rules.³³ VAT exemption on inputs and local supplies of raw materials is also likely to be specific, as it is often given on a selective basis. GATT MFN violation may also arise in such cases.

Export-based tax concessions based on output. An exemption from export duties is likely to be focused on a few sectors and hence be specific and actionable. As it is by definition linked to exports from these sectors, it is a prohibited subsidy. All other concessions are also linked to export performance and hence prohibited.

Export-based tax concessions based on inputs. Duty drawbacks are general tax provisions and are applied horizontally. They are not specific unless the remission of duties is in excess of those levied on imported inputs used in export production, in which case they become prohibited.³⁴ Direct tax credit for duties paid on imported materials and supplies given to selected firms based on sector or export performance is specific and actionable. Tax credit for net local content of exports is not only a prohibited export subsidy but also a TRIMs violation as a local content rule. Deductions of overseas expenditure and capital allowances for export industries based on exports are prohibited export subsidies. VAT exemption or remission on exported inputs is permissible, unless the remission is in excess of that levied on inputs consumed domestically, in which case it is a prohibited subsidy.

10.5.2 Financial Incentives

Some incentives involve financial contributions from the government, in the form of a direct transfer of funds or a potential transfer of funds or liabilities. Except in the case of direct grants and subsidized loans, there may or may not be a benefit to the recipient firm. The presence or absence of a benefit would depend on the market rates at which the same financing would have been available.

Government grants. All government grants confer a benefit and are therefore subsidies. Most direct subsidies given to cover capital, production, or marketing costs are given on a negotiated, case-by-case basis. This makes them specific. They are also often given on a regional basis, which makes them specific. Few countries have general objective norms for granting these subsidies. In the context of FDI, this is an important incentive.

Grants are the most commonly used instrument for attracting FDI in developed countries. They are normally given by subnational governments, which engage in intense competition on the level of subsidization. As specific subsidies, they are actionable. If they focus or target export industries, they are prohibited. Direct subsidies for employment or reimbursement of salaries for hired persons are normally norm based and are generally based on objective criteria. They would therefore not be covered by ASCM restrictions.

Government credit at subsidized rates. Subsidized loans and interest subsidies are often directed at specific investments or sectors and are therefore specific and actionable. If they are focused on exports, they are prohibited. Loan guarantees confer a benefit and are subsidies if they are at lower-than-market rates or reduce the borrowing costs of the recipient. If they are subsidies, the arguments for subsidized loans hold. Guaranteed export credits and export credits also need to be evaluated against market benchmarks to determine whether they confer a benefit.³⁵ If they are subsidies, they are prohibited, as they are linked to exports. Loans for job creation are normally subsidized loans, but as they are usually given on objective criteria, they are not likely to be specific.

Government equity participation. Government equity participation clearly involves a financial contribution. Whether there is a benefit to the firm is more difficult to establish, as that depends on whether the government decision was in line with normal commercial practice (difficult to establish) or reduced the firm's cost of borrowing (difficult to estimate the counterfactual). In the absence of a benefit, it is not a subsidy.

Government insurance at preferential rates. Provision of government insurance at preferential rates is generally provided in connection with exports, at lower-than-market rates. In such cases, it is likely to be prohibited, as there is a potential transfer of government funds.

10.5.3 *Other Incentives*

Incentives that are not financial or fiscal can be subsidies if they involve a financial contribution and a resultant benefit.

Subsidized infrastructure. Subsidized infrastructure involves a financial contribution, from which recipient firms benefit. Although a subsidy may be present, specificity is difficult to establish, as the incentives may be given on a horizontal basis to all firms as part of general provision of infrastructure by governments. Subsidized land and buildings may not fall in the category of general provision of infrastructure, but in the absence of specificity, they will not be actionable. If they are given only in specific regions or locations, they become specific and actionable.³⁶

Subsidized services. Subsidized services can act as an incentive. However, most of these incentives are provided horizontally, as part of across-the-board subsidization policies of governments, and so lack specificity. Better customs facilities may represent GATT MFN violations. Training assistance and subsidization of employee search and hiring costs lack specificity if granted on a normative basis. Export promotion assistance is a prohibited export subsidy if it is provided without charging costs, as it is contingent on exports.

Market preferences. Incentives that provide a degree of market protection are difficult to classify as subsidies. While they certainly confer benefits, the nature of the financial contribution from the government is difficult to classify. They may be considered as income or price support, but as there is no financial contribution from the government, they cannot be treated as subsidies and are hence not likely to be actionable.³⁷ In contrast, preferential government contracts clearly provide a financial contribution through government purchase. While specific in principle, because procurement is excluded from Art. III GATT, only signatories to the Government Procurement Agreement are subject to WTO disciplines in this area (see chapter 12 of this volume).

Preferential treatment on foreign exchange. Special exchange rates and special debt equity conversion rates are specific, as they are given to a few firms or sectors. Special exchange rates are often given in connection with exports and are prohibited subsidies. There may be potential GATT, MFN, and national treatment violations as well. Elimination of exchange risk on foreign exchange loans is also an actionable subsidy, as it may confer a benefit, depending on the fee charged for it. Concessions on foreign exchange credits for export earnings and free foreign exchange management and transfer are prohibited subsidies, as they are given in connection with exports. Other concessions related to foreign exchange, such as repatriation of earnings and capital, release of foreign exchange in lieu of domestic

contribution to a joint venture, and permissions to take foreign exchange loans, are not likely to be subsidies, as there is no direct financial contribution from the government. These are incentives that counter an adverse regulatory environment.

Other incentives. All other incentives—some of which are important for attracting investment—are difficult to quantify as subsidies, because no financial contribution is made or they lack specificity. They therefore do not fall under the ASCM.

Summing up, there is no specific coverage of investment incentives in the WTO rules. In the absence of such rules, there is acute competition among countries on providing incentives. This “beggar thy neighbor” approach is not beneficial to countries in the long run. Although some incentives could be covered under the ASCM, ASCM disciplines can easily be avoided and bypassed by designing incentives to be nonspecific. This is easier for developing countries, because they have almost no prohibited subsidies. While the concept of specificity is a useful one in the case of subsidies, it may have to be reexamined and if necessary a new concept created to address the issue of regulating investment incentives.³⁸ The TRIMs Agreement imposes far less discipline on investment incentives than the ASCM and may not even be a useful starting point for designing rules on investment incentives.

Given the current state of ASCM, most investment incentives can only be actionable. This is a more difficult path than prohibition. Prohibited investments could be identified on a list, or a concept similar to that of specificity could be used to determine which incentives are prohibited.

For developing countries, the issue of regulating investment incentives assumes importance in the context of the extensive use of fiscal incentives by developed countries to influence investment decisions. These countries cannot possibly match the value of the incentives given by developed countries.³⁹ Incentives used by developed countries—financial incentives in the form of direct government grants, fiscal incentives giving investment-based tax concessions, subsidized infrastructure and training allowances—are not easily actionable. They are often one-time concessions, and it is more difficult to isolate their effect on the price of a product than it is to determine the effect of indirect tax concessions or profit-based tax concessions, which form the core of developing country incentive packages. The other issue of concern for developing countries should be the provision of investment incentives by subnational governments in many developed countries. These are quite valuable and are more difficult to detect and regulate.

10.6 Problems with Incentives for Developing Countries

While the arguments for using incentives may appear persuasive, they are not an unmixed blessing for developing countries. The usage pattern of incentives

demonstrates the importance of targeting incentives. Designing appropriate incentive packages and administering them is difficult. In addition, the use of incentives can lead to complications.

The most difficult task is assessing the true value of an incentive package. If the purpose of incentives is to generate a higher rate of return for firms in order to attract investment, designing an incentive package requires a detailed analysis of the costs and benefits to the investing firm and the economy as a whole, with the incentive package adjusted to meet the difference between these two.⁴⁰ This is rarely done, with incentive packages usually set as a flat rate or through a negotiated settlement. In the absence of such an analysis, it is unclear whether the incentive package offered is appropriate, excessive, or completely unnecessary.⁴¹ For incentives to be effective, they should attract marginal investments that would not have been made in the absence of the incentive package. If incentives are granted across the board, they end up as a simple transfer payment, without achieving the desired policy goals.

Although they are used to correct for market failures in investment decisions, incentives often create distortions of their own. Just as tariffs modify trade flows, incentives modify FDI flows, distorting international production and investment decisions. Incentives also need to be financed—either through new taxes to support grants and subsidies or through compensatory taxes to make up for lost revenue from tax concessions. These taxes are a source of additional distortion.

Incentives used to target investment to specific regions or sectors or to compensate for an unfavorable policy environment need to be carefully targeted to the correct forms of investments so that the desired policy goals are met. Incentive packages also need to be supplemented by other policies to ensure that the desired outcomes are achieved. While some countries have managed this successfully, many developing countries lack the institutional framework and the necessary expertise. Moreover, the cost of administering incentives could be larger than the marginal benefit generated by the incentives themselves. Often incentives are focused on large multinational corporations, which are more visible than smaller firms. The danger of incentives being hijacked to meet vested interests also cannot be discounted.

The most intractable problem as far as incentives are concerned is incentive competition. Even if incentives can be justified on grounds of externalities or other reasons and all the problems mentioned above could be taken care of, there is still the problem that an incentive system ignores strategic behavior by other countries. Countries can be forced to provide more and more generous incentives in order to attract investment. This bidding rivalry can result in countries facing a prisoner's dilemma in which the winner is the one that can provide the best incentive package, which may be far in excess of what is economically justifiable. There is also a "winner's curse" that tilts the competition in favor of countries with the

deepest pockets. Competition on incentives to attract investment is pervasive, with not only countries but also subnational authorities offering incentives. There is a need to address this problem, which is detrimental to all and requires cooperation and coordination at an international level.⁴²

While it is possible to justify the use of incentives, it is not clear that they are effective in meeting the objectives for which they are used. While the evidence on the overall effect of incentives is mixed, it is clear that incentives are not the only factor determining investment decisions. Factors influencing FDI decisions include firm-specific advantages, internalization advantages, and locational advantages. Other policy and nonpolicy variables, such as freedom from burdensome regulation, nondiscrimination, political and economic stability, market characteristics, and raw material supply are also important factors in determining where firms locate.

10.7 Concluding Remarks

The evidence surveyed in this chapter shows widespread use of investment incentives and intense incentive competition among countries. Developing countries cannot compete with developed countries on many incentives. Distinct patterns of incentive usage are noticeable in different regions. Regions with similar incentive patterns also have differing experiences on investment flows. This demonstrates the limited role of incentives in investment decisions and also the difficulties in designing, administering, and targeting incentives. Therefore, it would be beneficial to regulate the use of investment incentives.

Within the WTO, there are no comprehensive disciplines on investment incentives. Current rules impose limited controls, which can be bypassed by designing incentives in an appropriate manner. New concepts would have to be created while framing rules on incentives. There is a choice of proceeding up the prohibited incentives path or the actionable incentives path. An interesting starting point could be from investment incentives which have low usage. Caps on financial incentives and making fiscal incentives determinate are other possibilities. Overall, it would be in the interest of developing countries to be proactive in discussions to regulate investment incentives.

Notes

1. The best way of tackling such a problem would be to fix the distorted price regime. Using incentives to counter such situations is a second-best alternative that may have other unintended effects.
2. The theory of the first best would require the problem to be addressed directly rather than routing these cost through investments made by private firms that are then compensated with incentives.
3. This definition of an incentive differs from the definition of a subsidy used in the WTO, as discussed below.

4. This may not be a major omission for many countries, but for federal states, such as Australia, Canada, and the United States, this omission may be significant.

5. Some other exclusions are sectoral restructuring incentives and aid given for crisis sectors, subsidization of regulatory incentives, R&D incentives, and double-taxation agreements. The conditions imposed precludes analysis of important issues such as technology transfer, regional development, sectoral focus, and export development, each of which is an important reason for seeking new investment.

6. These types of incentives have also been called *investment-related trade measures* (IRTMs). IRTMs primarily affect market access serving to attract FDI in markets in which trade measures disadvantage imports. They can be classified as market access restrictions, market access development preferences, export promotion devices, and export restrictions.

7. The database does not include miscellaneous concessions, for which uniform data were not easily available for all countries.

8. The 1996 survey focused on incentives used to attract inward FDI. It reviewed 103 countries for fiscal incentives, 83 countries for financial incentives, and 67 countries for other incentives. The 2000 UNCTAD survey (2000b) examined tax incentives only. It focused exclusively on developing countries and transition economies. The survey includes details of the tax systems of the countries reviewed.

9. Locating these sites is difficult, as investment promotion agencies do not have a uniform nomenclature and are therefore not easily found using a search engine. However, the Multilateral Investment Guarantee Agency of the World Bank maintains an excellent Web site (<http://www.ipanet.net>) with links to investment promotion agencies, export-processing zones, and other resources. This Web site was the starting point for locating many country Web sites.

10. Data on Bulgaria, the Czech Republic, Hungary, Latvia, Poland, Romania, the Slovak Republic, and Slovenia were obtained from Mah and Tamulaitis (2000). Some of these data were cross-checked from data available on the relevant Web sites of these countries.

11. Tax credits on domestic sales for exports (Sl. No. 26), tax credits for local content of exports (Sl. No. 29), tax credits on local content (Sl. No. 13), and export promotion assistance (Sl. No. 58) fall in this category.

12. Most EC incentives are for regional development or research and development. In the WTO context, many of these incentives are nonactionable subsidies under Articles 8 and 9 of the Agreement on Subsidies and Countervailing Measures. With the lapsing of these provisions, the compatibility of these subsidies with WTO rules is questionable.

13. Data on this are not included in this chapter. However, the value of such incentives can be large and needs to be examined separately.

14. There are only four countries in the region, and the availability of data from national investment promotion Web sites in this region is limited. Subnational governments in India offer substantial fiscal incentives at the regional level, but they are not included in this study.

15. Botswana offers almost no incentives but sells itself as a good investment destination with a low tax rate.

16. See Jackson (1997) for a detailed explanation of the effects of subsidies on trade.

17. Many types of government activities can be called subsidies. For the purposes of disciplines, the ASCM focuses on a subset of these that can have damaging effects on trade.

18. See Horlick (1994) for a detailed explanation of the features of the ASCM.

19. The contribution can be in the form of direct transfer of funds or potential direct transfer of funds or liabilities, forgone government revenue (or revenue not collected), or government provision or purchase of goods or services. Provision of general infrastructure by the government and exemption of an exported product from duties or taxes borne by a like product when it is for domestic consumption are not considered subsidies. The financial contribution can be made directly by the government or through a private body entrusted, directed, or financed by the government. Alternatively, the government could provide income or price support, as described in Article XVI of the GATT.

20. A party can benefit in many ways, some of which are listed in the agreement in Article 14. That list is not exhaustive, and *benefit* has to be understood in the usual meaning of the term.

21. This two-ingredient approach ensures that any regulatory benefit is kept out of the scope of the definition of subsidy under the ASCM. All regulatory actions by the government will lead to some benefit to some party. However, in the absence of any financial contribution, such a benefit cannot be a subsidy under the ASCM.

22. This has implications for regional development subsidies given by many countries.

23. It can be argued that the *de facto* test is a stringent one, as in practice no nonspecific subsidy can be applied uniformly to benefit all parties equally nor can any income tax law based on any criterion avoid being specific, as it excludes some parties from eligibility.

24. Items (h) and (k) of annex I give examples of situations in which a measure is not considered an export subsidy.

25. Articles 8 and 9 of the ASCM deal with nonactionable subsidies and were to apply provisionally for a period of five years, according to Article 31. The Subsidies Committee was to review the operation of these provisions and determine the extension of their application. As this did not happen, Articles 8 and 9 lapsed on this date.

26. Under Article 27.4 of the ASCM, developing countries can seek an extension of this transition period. The Committee on Subsidies and Countervailing Measures can permit this extension. The committee has also adopted special procedures to grant automatic extension until 2007 under Article 27.4 for eligible countries with export subsidy programs in the form of full or partial exemptions from import duties and internal taxes.

27. If the most favored nation obligation under Article I of the GATT is violated—for example, in cases in which import duty and tax exemptions are given as incentives only to a few firms rather than to all—this may discriminate between imports from different countries and thus be a violation.

28. If there is a violation of the TRIMs Agreement, there would be an automatic violation of GATT provisions on national treatment (Article III) and prohibition on quantitative restrictions (Article XI).

29. In the Indonesia automobile case, the panel held that sales tax and customs duty concessions were inconsistent with Article I.1 GATT, as they were not given on an MFN basis.

30. This concession for non-annex I ASCM developing countries expired January 1, 2003, but the Subsidies Committee agreed to extend this concession for certain types of export subsidies until 2007 for eligible countries.

31. The European Communities treat accelerated depreciation of assets as a tax reduction, with the subsidy calculated as the difference between the tax actually paid as a result of accelerated depreciation and the tax that would have been paid under normal depreciation. The difference is treated as a tax saving. This subsidy is treated as a grant and not as a tax deferral (see Waer and Vermulst 1999).

32. There cannot be a general exemption from import duties for all raw material imports, as that would imply a zero tariff.

33. In the Indonesia automobile case, the panel held that sales tax and customs duty concessions were inconsistent with GATT Article I.1 as they were not given on an MFN basis.

34. The European Communities determined that a duty drawback scheme operated by India called the India Passbook Scheme was not a permitted remission drawback scheme, because the remission was not calculated in relation to inputs actually consumed in the production process. See Waer and Vermulst (1999) for a detailed discussion of EC practice.

35. Internationally agreed-on benchmarks, as set forth in the second paragraph of item (k) on export credits in annex I ASCM, can also be used.

36. EPZs are in a specific location, and the subsidized infrastructure is contingent on exports. They therefore constitute a prohibited subsidy.

37. In the U.S. export restraints case, the panel held that many government measures have “effects” on the market but these measures cannot all be under 1.1(a)(1)(iv) of the ASCM, which requires an explicit and affirmative action of delegation or command. All government interventions that might in theory be deemed subsidies with the potential to distort trade are not necessarily subsidies under the ASCM. A subsidy requires not only that a benefit accrue but also that a financial contribution be made.

38. Daly (1998) raises some interesting conceptual issues for defining and measuring incentives. Should they be defined narrowly or broadly? A narrow definition could be limited to incentives that

can be measured directly, such as direct support through grants. A broad definition could include all types of incentives, financial or otherwise. Should incentives include those that are generally applicable to all investments or those that target specific sectors? How can incentives that are unconditional be differentiated from those that are conditional? How can incentives that are proportional to investment be differentiated from those that are capped (nonincremental)? How should the value of an incentive be measured—in terms of cost to the government or benefit to the firm (the two being quite different)? How can broadly defined incentives be measured accurately, given that the measurement of the value of some incentives is *ex ante* and of others is *ex post*? What influences investment decisions—the marginal value of an incentive or the average value? These conceptual issues need to be kept in mind in developing rules on investment incentives.

39. UNCTAD (2000b) provides some data on the value of subsidies. Government subsidies to industry in Organisation for Economic Co-operation and Development countries amounted to \$44 billion in 1993, increasing to about \$51 billion in 1997, with an average budget support of about 1 percent of value-added in manufacturing. These subsidies are largely in the form of regional development programs (31 percent), R&D and technological innovation incentives (19 percent), export programs (17 percent), assistance to small and medium-size companies (9 percent), and sectoral and crisis aids (7 percent). Aid to industry for environmental purposes accounts for less than 1 percent of expenditure. Despite the strict EC legal framework regulating state aid, the European Union provided an average of more than \$50 billion a year in aid between 1992 and 1994, about 4 percent of value-added in manufacturing.

40. UNCTAD (1996) gives two methods for calculating the true value of an incentive package, the social cost–benefit analysis method and the total protection method.

41. Brewer and Young (1998, 191) note that the “spiraling of aid to levels higher than those that are economically justifiable on grounds of externalities” leads to waste, misallocation of resources, and distortion of competition.

42. See Muchlinski (1995, 228), who notes that “competition over incentives amounts to a protectionist policy.” There is a need for a balance between the legitimate reduction of high start-up costs for foreign investors and wasteful public subsidization of private gain.

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ECONOMIC PERSPECTIVES ON A MULTILATERAL AGREEMENT ON OPEN ACCESS TO BASIC SCIENCE AND TECHNOLOGY

John H. Barton and Keith E. Maskus

This chapter sets out a general proposal for a multilateral agreement, most appropriately reached at the World Trade Organization (WTO), on free trade (more accurately, “open access”) in basic science and technology.¹ It discusses the economic foundations for such an accord, which we call an Agreement for Access to Basic Science and Technology (ABST), and analyzes the principal issues that would emerge in establishing it. The agreement could be founded on basic WTO principles and structured around open access for inputs (coordination and movement of research projects and scientific personnel), open access to outputs (basic research results), or both. It could also include provisions for preferential treatment for developing countries. Its central purposes would be to ensure widespread access to essential scientific results and to enhance the transfer of basic technological information to the developing world at reasonable cost.

We propose such an agreement for three main reasons, which we explain in this chapter. First, we share the increasingly widespread concern that government restrictions on access to data and research results could harm the pace of global scientific advance and the diffusion of knowledge, particularly to the detriment of transition economies and developing countries (David 2003; Maskus and Reichman 2004). Put simply, despite its inherent character as a public good, there has been a sharp policy shift toward making knowledge a private commodity, raising fundamental questions for science, education, and the diffusion of information.

The authors are grateful to Richard Baldwin and Bernard Hoekman for their helpful comments.

Second, issues of technology transfer are at the center of the contentious debate about how the WTO Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS) might affect developing countries. There is a common perception that despite the promise held out by TRIPS that stronger technology protection would expand flows of knowledge to poor countries, very few gains have emerged in this regard. At the same time, the exclusive rights offered by TRIPS bear the potential for limiting access of developing countries to even publicly generated basic research that might otherwise enable greater competition and local innovation.

Finally, the economics of knowledge creation and the nonrival nature of information imply that global investment in basic science and technology is surely underfunded relative to the global optimum. Knowledge is a prime example of a global public good that can be more effectively provided by cooperative multilateral actions.

In our view it is important to preserve and enhance the global commons in science and technology while setting out a public mechanism for increasing the international flow of technical information without unduly restricting private rights in commercial technologies. The agreement described in this chapter bears promise for meeting these objectives.

There are precedents for an ABST. The United States is party to numerous bilateral scientific exchange accords, some as treaties and some as arrangements between counterpart institutions. However, they apply solely to designated cooperative public sector programs. Recently, scholars have proposed an agreement among universities and research institutions on the free exchange of scientific data and in coordinating licensing arrangements (Reichman and Uhler 2003).

Section 11.1 sets out our concerns underlying the need for the proposed agreement. Section 11.2 examines the economic principles justifying coordinated intervention in the diffusion of basic research. Section 11.3 describes the essentials of an ABST and analyzes both its structure and political viability.

11.1 The Proliferation of Proprietary Rights in Basic Research

An essential reason for proposing an ABST is to offset the imbalances in access to knowledge arising from two fundamental policy changes. First, governments are increasingly imposing restraints on the use of knowledge generated by public research or through public funding. Such restrictions arise in part from regulations designed to protect national competitiveness. Under the U.S. Bayh-Dole Act, a license to use technology developed from federally funded research must be awarded preferentially to national firms. In 2002 the European Union established

a European Research Area, with several restrictions for EU firms regarding the use of publicly funded research results.

Other restrictive regulations emerge from the increasing scope of intellectual property protection for basic scientific results in the European Union and the United States, which remain the primary generators of knowledge. This protection is expanding beyond products and applied technologies to basic ideas, procedures, and materials, which had not been the subjects of proprietary rights under traditional intellectual property norms. The United States grants patents on basic research tools and scientific methods of discovery in genetic sciences. In doing so the classical utility standard, under which an invention had to be reduced to a commercially useful product or process (as opposed to a scientific method) has been diminished significantly as a bar to gaining exclusive proprietary rights to basic knowledge. The United States also permits patents on research tools with broad reach-through claims, extending property rights on basic inventions to applied innovation. This policy raises fundamental concerns about “anti-commons” effects in biotechnology and materials sciences as the transaction costs of acquiring licenses rise (David 2003; Heller and Eisenberg 1998). A recent U.S. court decision greatly narrowed the research exemption in patent law that was long permitted as a means of legitimate science and competition.²

In its 1996 Directive on the Legal Protection of Databases, the European Commission established a *sui generis* regime for the protection of data compilations (David 2004; Reichman and Uhler 2003). Exclusive rights are available for the developers of commercially useful databases, even where the data are compiled from public research results and information already in the public domain. Thus the regime offers proprietary rights on creations of limited inventiveness, and, because the protection is renewable, it is stronger than limited-duration patent grants. These restrictions on data use in the European Union offer little scope for fair use procedures that hitherto permitted reasonable access by researchers and educational institutions. Certainly those rights are considerably stronger than the global standard (as established by the WTO Agreement on TRIPS) of protecting databases solely with copyrights. For our purposes, the primary concern is that such protection may reduce access to publicly generated basic research results. Meteorological data generated by government research stations are now frequently sold under private rights. The European Commission’s directive may soon be emulated in U.S. law, as legislation to protect databases on a similar standard has repeatedly been brought forward in Congress.

We are concerned that excessively restrictive standards for granting proprietary rights to basic knowledge may be extended globally through various negotiated initiatives. For example, under the auspices of the World Intellectual Property

Organization (WIPO), deliberations are under way regarding a global Substantive Patent Law Treaty. The essential objective of these negotiations is to harmonize standards for patent eligibility and examination procedures in order to minimize transactions costs. It is possible that recently evolved standards in the United States, including minimal utility, low inventiveness and novelty, and broad claim coverage, could be established in this treaty, significantly limiting access of researchers and competing innovators on a global scale.³

Another concern relates to the effects of intellectual property rights on international technology transfer. Governments in many countries place great importance on the ability of local firms and researchers to acquire technological information on reasonable terms. Economic evidence suggests that, in the long run, the stronger technology protection standards required by TRIPS should provide firms in developing economies significantly greater private technology inflows, mediated through imports, foreign direct investment (FDI), and licensing.⁴ However, the likelihood of these increases depends on such national characteristics as size, proximity to markets, infrastructure quality, local imitative capacity, and the ability to absorb, modify, and deploy new technologies. Indeed, much of the additional technology transfer on offer may be from parents to affiliates within a multinational enterprise, with diminished capacities for spillovers to local firms. More directly, strengthened proprietary rights to knowledge raise the likelihood that firms may act more monopolistically in setting prices for information. Thus increases in technology flows are not guaranteed—and may not emerge at all in the poorest economies (Smith 2001).

While there is considerable small-scale innovation in developing countries, they remain net importers of new technological information, which is the primary source of technical change and an important determinant of productivity growth (Hoekman, Maskus, and Saggi 2005). In this context, access to general knowledge emanating from basic research in the technologically advanced economies, no less for developing countries than for the developed nations themselves, is central to the processes of experimentation, adaptive innovation, and product development. Put differently, fundamental science generates the enabling technologies from which dynamic competition springs (David 2003). Significant restraints on access to such scientific results could pose difficulties for competition, particularly in developing countries.

Such concerns about technology transfer surfaced in TRIPS itself. According to Article 7, a primary objective of the agreement is that intellectual property rights should contribute “to the transfer and dissemination of technology, to the mutual advantage of producers and users of technological knowledge.” To give content to this objective and to promote technology transfer to poor countries, negotiators agreed in Article 66.2 that “developed country Members shall provide incentives

to enterprises and institutions in their territories for the purpose of promoting and encouraging technology transfer to least-developed country Members in order to enable them to create a sound and viable technological base.”

Authorities in many developing countries are disappointed in the evidently meager response of technology flows to these indirect and direct incentives.⁵ For this reason, WTO members affirmed in paragraph 11.2 of the Doha Ministerial Declaration that the provisions of Article 66.2 are mandatory. The declaration calls for a mechanism for ensuring full implementation of that obligation and set up a Working Group on Trade and Technology Transfer. To date the working group has collected submissions from developed countries describing the incentives they have in place to encourage technology transfer to poor countries. While these submissions are many and detailed, the programs described tend to be small, focused on specific projects, and not specific to the needs of the least developed countries (LDCs). Moreover, the article is restricted to the least developed countries, a subset of developing countries in which the private sector technology transfer envisioned by the article is particularly difficult.

That supply responses in technology transfer have been meager to date is not surprising in economic terms. “Technology transfer” refers to a host of complex transactions that depend on a variety of factors, only one of which is the intellectual property rights system. New intellectual property regimes have only recently been in place in many countries, and they have yet to be strongly enforced. Most significantly, international technology transactions are undertaken primarily in private markets. While governments can provide some subsidies, tax advantages, research subventions, and credit guarantees, ultimately they cannot force the private sector to transfer its technologies.

Though the issue surfaces most directly in TRIPS, the need to enhance technology transfer appears in several other WTO agreements, suggesting that it is a broader concern than may be reflected in intellectual property rights. Such language exists also in the General Agreement on Trade in Services (GATS), the Trade-Related Investment Measures (TRIMs) Agreement, the Agreement on Technical Barriers to Trade, and the Agreement on Sanitary and Phytosanitary Measures. Furthermore, any prospective agreement on competition policy would presumably address various aspects of technology markets.

Despite this coverage, many developing countries believe that the WTO agreements do not adequately address means for facilitating effective technology transfers to their markets (Roffe 2002). To some degree this reflects a preference that the transfer of private commercial technologies be subsidized or made available without private property rights attached (Becker 2002). Neither possibility is likely, as fiscal subsidies to transfer commercial technologies would run into political opposition in home countries, while eliminating intellectual property rights

in commercial information (through patent buyouts, compulsory licensing, and the like) would run counter to the nature of TRIPS itself.

11.2 Economic Perspectives

To advocate a multilateral policy intervention on behalf of open access to basic science and technology, we must demonstrate that the approach would help resolve market failures in the private generation of knowledge and its use, provide advantages over a system based extensively on proprietary rights to basic science and technology, and improve multilateral policy coordination in this area. To this end we begin by considering the economic nature of basic technological knowledge.

11.2.1 *The Economics of Knowledge Creation and Diffusion*

Generations of writers have explained the fundamental characteristics of knowledge as a public good. Thomas Jefferson compared an idea to the flame of a candle, which could be used to light other candles without diminishing the original light (David 1993). Thus the defining feature of knowledge is its nonrivalry: access distributes the gains from its use widely without reducing the ability of developers to use it. In turn, the social value to multiple uses is the sum of all the individual valuations, a sum potentially far larger than its value to an individual user. However, this same characteristic immediately generates a free rider problem, because anyone who can gain access to an existing idea would rationally refuse to offer to bear any of the initial costs of developing it. Nonrivalry is a technical characteristic suggesting nonconvexities in the use of ideas; optimal social policy would call for the widest possible use of existing knowledge, assuming the marginal cost of additional provision is small.

A second feature of knowledge is that it may be difficult to maintain exclusive possession of it while putting it to some useful purpose. Attempts at secrecy often fail. Moreover, some technologies, such as medicines and software, are easily learned through simple imitation. There may be technical and legal solutions that aim at generating exclusivity, but the stronger these are, the more costly is access to information.

Taken together, these characteristics imply that the creator of an idea often fails to capture the full returns from investing in it. This nonappropriability problem necessarily implies that knowledge is a public good. Indeed, in Arrow's (1962) classic conception, it is the purest form of public good. Accordingly, market actors would not undertake costly investments in developing new information, and society would suffer from a diminished rate of technical progress.

This essential market failure calls for public intervention, which has by tradition taken place through a mix of two canonical policies. The first approach is to provide substantial direct funding to research in order to solve the underinvestment

problem. In the United States the federal government spends tens of billions of dollars a year funding research grants to universities, government laboratories, and private research centers. It also provides subsidies through tax incentives for private firms to undertake research and development. Systems in Europe and Japan are similar, if not as large. These programs have directly accounted for the development of massive amounts of basic technology that supported extensive commercial invention.

The second approach is to safeguard the ability to earn returns to investment in research by providing exclusive intellectual property rights. Patents, copyrights, trademarks, trade secrets, and related devices protect different forms of innovation and operate in different fashions, but all offer exclusivity in the production, use, sale, and licensing of designated subject matter. These are essentially market-based inducements to R&D, for firms are free to invest in whatever programs they think will achieve market success. They are also incentives for placing new products and ideas on the market, the ultimate source of welfare gains from innovation. In contrast, government direction or funding of commercial research is generally ineffective, because the public sector may have limited information about dynamic market prospects and is liable to make politically motivated and inefficient allocations of research funds. To be sure, in some circumstances intellectual property rights can support substantial market power and induce wasteful duplication of R&D spending. Nevertheless, they seem to be an integral support for technological competition, at least in innovative economies, and typically do not constitute significant barriers to entry.

There are no definitive principles for determining the appropriate mix of public funding for research and proprietary rights to research outcomes. The conventional solution in most societies has been to draw a fuzzy line between investments in basic scientific knowledge and applied research in specific processes and products with commercial applicability. Basic research could be considered true public goods, in that it is both nonrival and offers general knowledge that can support multiple uses. Private markets would thus fail to invest sufficient resources in its generation, requiring a public solution. Applied research in specific processes and products with commercial applicability is more properly construed as a quasi-private good, because of its specificity and relative ease of technical or legal excludability. Regulatory instruments should typically be sufficient to ensure its market provision.

This distinction is central to both conventional research policy and intellectual property rights. The bulk of U.S. government-performed research findings and data, except for that reserved for security purposes, has traditionally been placed in the public domain. University scientists operate in a vigorous "open source" mode, in which their findings are thoroughly vetted and published for wider use. The gains to successful scientists in this environment stem from building

reputation assets rather than property rights, though reputations may be manifested in higher incomes. Thus by tradition basic scientific results have found their way readily into the public domain for anyone of competence to use.

Conventional conceptions of intellectual property rights firmly embody this distinction between basic knowledge and commercial applications. Most prominently, in most countries outside the United States it is impermissible to patent basic discoveries (as opposed to inventions), mathematical algorithms, and genetic research tools. Furthermore, for a patent to be awarded, the invention must meet a utility standard under which the technology must be reduced to some industrially or commercially useful form. A rigorous utility standard is a central means by which public authorities deny proprietary rights to basic scientific knowledge. For its part, the United States has greatly weakened its utility standard, permitting property rights to be granted on basic enabling technologies.

Also relevant is the inventiveness standard, under which a new technology must display real creativity in order to achieve exclusive rights. The European Union's Database Directive vitiates this requirement by awarding patentlike protection to simple compilations of data and information on the theory that "sweat of the brow" effort is sufficiently creative to deserve reward. This diminution of an essential standard also threatens to remove important research results from the public domain.

Taken together, the expansive U.S. and EU treatment of public research findings as commodities on which property rights may be asserted has significantly eroded the practical distinction between basic knowledge and applied R&D. The political rhetoric justifying the mixing of public funding with private rights is couched in competitiveness terms. Specifically, it is argued that the mixture will procure greater economic rents from the public investment in research and provide more incentives for product development, to the ultimate benefit of society.

It remains to be seen whether this salutary outcome emerges in the context of technologically advanced countries. It is by no means a settled issue among scientists, economists, and legal scholars, several of whom have expressed significant concerns (Mowery and Sampat 2004; Nelson 2004). A careful look at licensing regimes emerging from patents on basic tools in biomedical research suggests that transactions costs in organizing scientific inquiry have increased markedly (Heller and Eisenberg 1998).⁶ Ideas are inherently heterogeneous, and the costs of merging them into useful technologies are likely raised by intellectual property rights on scientific knowledge. By raising licensing costs and extending reach-through proprietary rights to all potential new innovations using those technologies, providing patents to basic technologies can be harmful to dynamic competition (Aoki and Nagaoka 2003).

This concern is buttressed by the fact that open-access basic science and commercial R&D traditionally have enjoyed a complementary relationship, with basic science having little direct utility in terms of marketable goods but supporting a range of innovative products and follow-on technologies. Put differently, open science tends to raise the expected returns to private investment in proprietary R&D, for several reasons (David 2003). Access to existing knowledge provides developers with a roadmap of promising areas in which to invest and likely dead ends, increasing the efficiency of capital allocation. Public funding for university research and training generates high-quality technical personnel, who often move into industrial employment, a key element of technology transfer in the United States. These spillovers serve as a general subsidy to applied R&D. As proprietary rights are extended on public research results, the scope for such spillovers is likely to be diminished.

Ultimately, the mix of intellectual property rights and public provision of research needs to strike a balance between resolving problems of appropriability in order to induce investment and commercialization and ensuring that basic knowledge is accessible and widely distributed. The diffusion and use of knowledge itself serves as a platform for both further basic research and development of applied technologies.

We have argued that the increasing application of proprietary rights to publicly funded and basic research results may be problematic, even within the European Union and the United States. Research universities and large firms in the European Union and the United States may be able to engage in sufficient patent pooling and cross-licensing that their research programs are not greatly inhibited (Walsh, Arora, and Cohen 2003). However, it has been observed that start-up firms and small enterprises in developed countries have been placed at a distinct disadvantage in this context (Reichman and Uhler 2003).

This problem is compounded when one considers research processes in most developing countries. Public research institutes, university science and education, and the development and diffusion of applied technologies all depend on access to basic knowledge, which is overwhelmingly generated in the rich nations (Evenson 2004). Increasing privatization of basic data by entities in the developed countries threatens to retard the diffusion of such knowledge into science and competition in developing countries. Few of these countries are in a position to mount significant public funding for basic research in their own universities and institutes. Thus we remain concerned that one significant outcome of intellectual property rights policy in the European Union and the United States will be higher costs for, and diminished access to, the fundamental scientific results that have been a foundation for technical change.

Put another way, public research has traditionally generated large spillover benefits across borders in the forms of improved education, research, and

competition. Technological change is the main engine of growth, but learning from such change, and contributing to it, requires basic educational, scientific, and technological capabilities. Thus access to knowledge is central to prospects for growth and transformation, especially for developing countries. The more such knowledge is protected by exclusive rights, the less these spillovers are likely to take place.

11.2.2 Why Is a Multilateral Agreement Needed?

Knowledge is a global public good, because its nonrivalry clearly transfers across borders. Widespread international access to basic knowledge generates multilateral gains in terms of science, education, technological change, and dynamic competition, even as it reduces the economic rents that might be available to those entities that would control its diffusion. Seen in this light, it is unsurprising that those technologically advanced countries generating the major share of global knowledge increasingly view it as a source of competitive advantage if it can be protected on a preferential basis.

However, if we conceive of basic science and technology as an essential component of the public and global commons, then we must recognize that national governments cannot be expected to provide such investments at the optimal international level. Governments may fail to provide sufficient resources to support nationally optimal levels of basic science and technology research, even for their own economies for several reasons, ranging from higher priorities within limited budgets to political-economic structures that disfavor the provision of national public goods. The failure also reflects, in some part, the nonrivalry problems discussed above, which manifest themselves in too little domestic science and a heavy reliance on access to international science. Most developing countries may be characterized as having inadequate education and research infrastructures, along with little effort to promote scientific research. Without adequate access to general technologies, their attempts to develop effective national innovation systems are unlikely to bear much fruit.

A more fundamental problem is that national governments, acting on their own to establish support policies for basic science and technology, will jointly underinvest in that area from a global standpoint. The essential difficulty is the nonrivalrous nature of basic science and technology. In setting subsidies for the development of basic knowledge, individual countries would not take into account the spillover benefits to other countries (Drahoš 2004). That is, each country would rationally fund research up to the point at which the marginal cost of developing knowledge equals the sum of the marginal valuations of all domestic users. Because the domestic marginal cost would be less than the sum of

international valuations in any nationally determined equilibrium, too little investment in basic knowledge would be undertaken, even in the absence of free riding. That is, even if international valuations were known, individual countries would be loath to fund additional knowledge to meet international needs. If we add the unwillingness of importing countries to reveal their social valuations for knowledge to this equation, the situation is made even worse.

In asserting private ownership rights to basic knowledge, the European Union and the United States are essentially trying to solve the international free-riding problem, but they are doing so in an inefficient manner. While extracting some international surplus for the fruits of its investment, the U.S. policy does so on behalf of private interests rather than the public purse. More important for welfare, the provision of private exclusive rights can be expected to reduce net international access to information and, if transactions costs are raised sufficiently, inhibit future investments in technology. Put in the language of economics, strong intellectual property rights endowed upon basic research results are the wrong instrument for meeting the dual targets of expanding investments in knowledge as a global public good and making it widely available.

In principle, there are two appropriate solutions to this set of problems. The first would be for a centralized global authority to fund the development of basic technologies that cost less than the sum of global valuations. No such central authority exists, however, and this solution cannot be considered feasible.

The second would be a multilateral agreement on access to basic science and technology, the proposal advanced here. A bargaining approach could permit countries to exchange concessions about access to their own basic technologies, recognizing that their own educational and technological enterprises would benefit from reciprocal access. The reciprocity associated with bargaining can mitigate some of the spillover problems deterring investments. There may be some decrease in political incentives to invest in research, because the competitiveness motivations would be less intense, but this decrease would be reduced by the reciprocity requirement, and any impact that it may have should be counterbalanced by the increased productivity of the global research enterprise. Moreover, to the extent that bargaining permits rationalization of basic research, in the sense of avoiding wasteful duplication of similar programs, bargaining can mitigate the underlying provision problem as well. Research costs in some forms of basic science may be so large that private rights could not generate sufficient revenue to cover them. In some cases shared financing across governments may be required.

In the following section we set out the framework of an ABST and discuss why the WTO is the appropriate forum for achieving it. We also consider the feasibility of such an agreement in terms of the political economy of market access exchanges.

11.3 An Agreement for Access to Basic Science and Technology

Too little basic science is developed today, and too little of it flows to developing countries. An intellectual property system needs to be complemented with a mechanism for resolving these failures.

In our view, an ABST would be best fashioned within the WTO, for several reasons. First, without a multilateral agreement to discipline free riding, any bilateral or plurilateral agreement is liable not to be sustainable. Second, the WTO already has responsibility for major agreements governing intellectual property, subsidies, standards, and trade in services, all of which would be strongly interrelated with the transfer of scientific results. Third, the WTO offers a recognized format for arbitrating and settling disputes between governments, which would be primary players in this treaty. Fourth, the WTO has a dynamic negotiating process that permits trade-offs to be made in concessions across sectors and functional agreements. Fifth, the WTO has become a focal point for strengthening national constituencies seeking the benefits of multilateral agreements. Finally, many of the essential WTO principles may be applied to an ABST.

11.3.1 *Format of an Agreement*

The treaty would need to include several provisions. The first, and most basic, would be its scope in terms of subject matter and processes. We have used the term “basic” science and technology, but it is not easy to determine the dividing line between basic and applied research. In principle, one would describe basic knowledge as that which is truly nonrival and, by itself, has limited commercial utility. Examples are numerical formulas, algorithms, discoveries, surgical methods, research tools, and genetic sequences. Such forms of knowledge are not patentable under most legal jurisdictions, except in the United States. Another class of basic technologies is technologies supporting the provision of global public goods, such as environmentally sound processes and health care.

There is no clear practical sense in which these characteristics might be defined. One way to manage the distinction would be to include research processes, results, and data that are largely publicly funded, whether through direct research in government laboratories or grants to universities, nongovernmental organizations (NGOs), or other institutions. This distinction between technological characteristics and funding may not be critical, since presumably most basic and public goods technologies require public financing. Thus focusing on publicly funded research and data may be sufficient.

A second aspect of scope relates to the forms in which access is to be granted, or the nature of liberalization. In principle, three levels of commitment could be entertained:

- “Input liberalization” would permit researchers from other countries to participate in, or compete with, local research teams for grants and subsidies. This could be combined with increased opportunities for the temporary migration of scientific personnel and the granting of more student visas. Provisions could prohibit granting preferences to national firms and institutions for publicly funded research consortia and access to research-based tax advantages. Commitments could be reached that narrow visa restrictions that inhibit the ability of students to study at universities in other countries or restrict the scope for scientists and engineers to participate in conferences or training programs. Under this alternative, governments could choose to reserve their research results for preferential use by local firms and the registration of intellectual property rights. While this approach could expand research efficiency and transfer more skills abroad, its scope for increasing access to new information would be limited.
- “Output liberalization” would entail offering researchers in other countries access to nationally generated science and data, without increasing their ability to use underlying funding or research facilities. This approach would usefully expand the public commons and increase knowledge transfers, but it would not directly expand efficiency or transfer research skills. A key provision here would promote access to scientific databases and ensure that intellectual property regulations do not limit access to basic scientific knowledge.
- “Full liberalization” would combine these regimes, both expanding international flows of research contracts and personnel and increasing global access to outcomes. We favor full liberalization to the extent that it is politically feasible. In getting there, however, it may be necessary to adopt something like a GATS approach, permitting governments to reserve sensitive areas of technology and designate different levels of commitment to open access.

Consistent with other WTO agreements, national treatment would be a key legal provision of the treaty, requiring that, in as many ways as possible, foreign scientists and firms be treated the same way as national ones with respect to access to a country’s scientific and technical support programs and outcomes. Like TRIPS, an ABST could also build on an most-favored-nation (MFN) commitment, unless there were compelling reasons for granting regional preferences.

A treaty of this kind would need to be balanced by safeguard clauses. One issue involved in international scientific and technological collaboration relates to the

equitable and efficient distribution and management of intellectual property that could emerge from subsequent applied innovation. Another is that concerns regarding national security and technology proliferation would need to be addressed. For example, the United States has moved to establish new security classifications for biological data and restrict some foreign students from studying certain areas of biotechnology. Such restraints need to be balanced with the advantages of promoting the scientific and technological commons, a balance that could be set out in an international agreement.

In recognition of the need for encouraging a sound and viable technological base, certain preferential advantages could be granted to developing countries. For example, where fees are charged to obtain data and research results, differential pricing schemes for governments and institutions in developing countries could be encouraged. Efforts to encourage research participation by scientists and engineers from developing countries could be written into proposal solicitations. Additional visa allocations could be aimed at students and researchers from developing countries. More generally, developed countries could commit themselves to help developing nations build capacity for improving educational and scientific processes, including their ability to benefit from international information. Assistance in the development and use of electronic resources, especially the Internet, could be particularly valuable.

While perhaps not fitting within the parameters of a treaty, additional commitments would be beneficial. Donor nations might consider establishing special trust funds to encourage research and science in developing countries and to help them benefit from an ABST and other international commitments (Roffe 2002). Of particular importance would be expanded commitments to support programs for providing public scientific and technological goods to developing countries. Examples include the Consultative Group on International Agricultural Research and the new public-private partnerships for research on HIV, tuberculosis, and malaria. Such programs are greatly underfunded (Commission on Macroeconomics and Health 2001). Financial commitments could be supplemented by agreements to help manage potential problems with intellectual property rights, including access to patented technologies.

Two other issues arise for construction of an ABST. First, careful consideration is needed of how its provisions relate to other WTO agreements and even such non-WTO accords as the Convention on Biodiversity. Within the WTO, efforts to harmonize an ABST and TRIPS would be required. In effect, an ABST would be an attempt to rebalance the strong privatization of rights in information implicit in TRIPS. Similarly, specification of an ABST could usefully sort out the meaning of precompetitive research subsidies and how they might be provided internationally. However, some forms of research support could be problematic in terms

of the WTO Agreement on Subsidies and Countervailing Measures.⁷ Mode 4 of the GATS might need to accommodate more liberal treatment of temporary research and educational visas.

Second, provisions would need to be made for regular meetings, for a small secretariat or council to evaluate the extent of scientific and technological cooperation and its benefits, and for ongoing negotiations. These negotiations could provide a forum for scientific and technical communities to pursue further expansion of the global information commons.

11.3.2 Arguments for Concluding an ABST

Developing a global treaty on science and technology could serve several purposes. First, the European Union, the United States, and other developed economies are rapidly moving toward establishing private property rights in basic knowledge and data, even when developed from public resources. This tendency threatens to substantially reduce the amount and scope of information in the public domain, with deleterious impacts on the provision of public goods and on prospects for dynamic competition. This “new enclosure movement” may be detrimental even for the countries that practice it (Boyle 2003). However, it raises significant difficulties for the diffusion of information to developing countries and the prospects for building a capability in science and technology. An ABST could be a means of recapturing publicly funded and basic research for the public domain and encouraging knowledge transfers to developing economies.

Second, many countries remain disappointed with the apparent inability of TRIPS and other WTO agreements to induce additional and large transfers of technology. Those provisions are aimed largely at the transfer of commercial technologies. An ABST would focus on the transfer of basic (and somewhat less commercial) technologies. It would rebalance benefits under TRIPS in favor of technology users. An ABST would complement, not substitute for, a supporting mechanism for market-mediated technology transfers.

Third, TRIPS recognizes the need to build “a sound and viable technological base” in developing countries without providing any means for achieving it. Surely one important reason why there has not been much expansion of technology flows to developing countries since the implementation of TRIPS is that this technological base often is not sufficiently viable to reduce the transactions costs of transfers. No doubt much capacity needs to be built, in terms of governance, transparency, infrastructure, and other environmental characteristics, before much scope for private technology transfers to some countries could emerge. But a central component must be the construction of a national science and technology capability for adapting technologies to local needs and performing local

research. If the ultimate outcome of TRIPS and stronger protection in the rich nations is to restrict access to basic research and data from abroad, the prospects for building such a capability could be irrevocably damaged. Our proposal aims at sustaining and enhancing such access.

Fourth, TRIPS Article 66.2 makes reference solely to LDCs as potential beneficiaries of government efforts to encourage private technology transfers. Thirty WTO members are designated LDCs, a roster that hardly exhausts the list of countries that could benefit from greater access to scientific opportunities and results. Article 66.2 can do virtually nothing to provide access to basic technology on behalf of the broad scope of developing countries. In contrast, an ABST would be a global agreement.

Finally, such a treaty could be structured in a way that, while restraining the movement toward privatizing rights in basic information, would respect exclusive rights in commercial information and applied technologies. Inevitably there would be difficult negotiations over international benefit sharing and licensing terms at the interface between basic science and technology and its commercial applications. However, such negotiations should be more efficient when undertaken against a backdrop of an international legal agreement regarding access and rights allocation.

11.3.3 Political Economy Issues

Our proposal aims at resolving the problems described earlier, but it focuses on the free rider problems that have pushed science providers into an increasingly protectionist treatment of information. That treatment is protectionist in that it limits foreign access to basic knowledge in a manner analogous to trade restrictions that limit market access. As such, a WTO approach that offers reciprocal and nondiscriminatory access to knowledge is appropriate for restoring the public domain and promoting international competition.

The treaty we have in mind would increase global access to the fruits of public research funding. An obvious difficulty is that research decisions are endogenous, and funding might decline if the major countries perceive that an ABST would dilute the ultimate economic benefits from such investments without reciprocal benefits from abroad.

Thus analysis of national economic interests in an ABST is relevant for considering its construction and feasibility. Mutual trade liberalization in the WTO has been achieved through a mercantilist agenda in which countries are willing to offer greater market access to foreign firms in return for reciprocal access abroad. A similar reciprocity, in which access of foreign researchers to grants and research results

is provided in return for related opportunities abroad, could appeal to competitiveness concerns. A broader scope of opportunities and research competition presumably would expand the efficiency with which public science and technology are generated, resulting in mutual gains from trade. The opportunity to negotiate liberalization will focus the attention of those in the scientific and technological communities on pressing politically for the benefits of liberalization. Moreover, with a wider base of basic technologies from which to work, and with these technologies largely in the public domain, the scale of product innovation built on such information should increase.

Countries are highly asymmetric in terms of their abilities to finance and develop basic science and technology. The European Union, Japan, and the United States may see some complementarities in mutually integrating access to these resources. Some large developing countries, such as Brazil, China, and India, could be attractive as well. But small and developing countries with limited research resources offer little in the way of “export” interest to researchers in the main technology-developing nations. In this environment, governments of the developed countries might effectively restrict access by encouraging exclusive rights in research outcomes and data, as they are doing. Yet even the United States, by far the preeminent technological power, is now seeing the need to depend on scientists from other countries (National Science Foundation 2004). Thus it is not yet clear whether there is a balance of mercantilist interests to support a multilateral ABST.

In consequence, a WTO treaty to ensure access to basic science might require technology importers to offer other, perhaps complementary, concessions in such areas as services, investment, and product market access. In addition, the case could be made that firms in the poorest countries pose no competitive threat in the medium term and that permitting them to join on a preferential basis could help develop their research and innovation capabilities, in line with other development assistance.

There is another reason to think that an agreement may be supported by powerful economic interests. Unlike the situation 30 years ago, multinational enterprises now often transfer technology in order to build export products in developing countries. The costs of doing so would diminish if local researchers had access to basic technologies and could effectively deploy them. Thus multinational enterprises might be expected to lobby for such an agreement, particularly to the extent that it were accompanied by appropriate policy responses in recipient countries regarding governance and infrastructure. Furthermore, the treaty would provide legal certainty about the scope of the public and private domain across countries, which would benefit global enterprises.

11.3.4 *A Less Ambitious Approach*

While we are optimistic about the prospects for such an agreement to work, we recognize that the problems noted above are serious and raise obstacles to the negotiation of a maximal treaty. In that context, we suggest a less ambitious approach that could achieve some of the objectives we have identified for greater international access to basic science and technology. This approach would work through the intellectual property system itself.

From the standpoint of distinguishing between basic and applied research, it would be beneficial for countries to reassert the importance of a rigorous utility standard in patenting. For those jurisdictions, such as the United States, that offer patents to basic research tools and software, careful consideration to limiting the breadth of reach-through claims is in order. For their part, developing countries should avoid adopting weak eligibility standards for patents and broad claims of this kind while sustaining research and education exemptions in the use of patented knowledge. Negotiations at WIPO regarding the Substantive Patent Law Treaty offer scope for rebalancing patent rules on behalf of restoring the public domain in this way.

If governments insist on permitting the registration of private rights on the results of publicly funded basic research, they could limit the risk that such rights would support monopoly restrictions on access by establishing careful guidelines on licensing, as suggested in Nelson (2004), or a wide domain for automatic licensing upon receipt of a modest fee. This form of “liability rule” would permit those who wish to use fundamental scientific results to do so upon payment of a well-understood licensing fee or royalty (Lewis and Reichman 2004). In establishing such a system, it should be feasible to organize a fee schedule that discriminates in favor of users in developing countries and educational institutions. This kind of price differentiation is an especially attractive form of gaining some returns on investment in research while encouraging wider dissemination.

11.4 Concluding Remarks

We have outlined a proposal for negotiating a multilateral agreement on open access to publicly funded research results and data. In our view, this agreement could have at least five global benefits. First, it would help resolve the free rider problems that reduce investments in science and technology relative to the global optimum. Second, it could restrain the tendency of governments to restrict access and to encourage privatization of basic knowledge. This rebalancing of technology development norms in favor of expanding the public domain could help vitalize scientific research in many countries while promoting applied innovation. Third, the treaty could provide an important plank for the construction of

modern technological capabilities in developing countries while sustaining access to information for educational purposes. Fourth, the treaty would not unduly restrict the rights of firms to exploit intellectual property in applied technologies and products. Fifth, it could help restore confidence on the part of developing countries that TRIPS and the WTO are institutions that facilitate, rather than hinder, technology transfer.

This chapter sets out the case for such an agreement. Undoubtedly, numerous practical difficulties would arise in working out specific provisions and defining terms. Even determining what “publicly provided” or “basic science and technology” mean is not easy. Nevertheless, we believe the principles set out here can offer a platform for moving forward.

Notes

1. The idea for this agreement was advanced earlier by Barton (2003b).
2. See *Madey v. Duke University*, 307 F.3d 1351 (CAFC 2002).
3. Barton (2004) analyzes prospects for this treaty and argues for more competitive and development-relevant standards.
4. Maskus (2000) provides a comprehensive review of such evidence; Smith (2001) offers recent empirical evidence.
5. The assertion that technology transfer has not increased much since TRIPS is not based on a systematic review of the evidence, which is needed. Barton (2003a) reviews evidence that the world's move toward stronger intellectual property rights has contributed to greater FDI in some sectors and may favor FDI over development through indigenous technology-based enterprises.
6. See Walsh, Arora, and Cohen (2003) for a skeptical survey-based view of the proposition that these costs deter scientific research. Their data, however, indicate that there were sometimes costs and delays, associated with obtaining licenses, conducting research offshore, running the risk of infringement, or modifying research strategies, for example.
7. Hoekman and Kostecki (2001) provide a comprehensive discussion.

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MONITORING IMPLEMENTATION: JAPAN AND THE WTO AGREEMENT ON GOVERNMENT PROCUREMENT

Simon J. Evenett and Anirudh Shingal

A wide variety of instruments are employed in World Trade Organization (WTO) agreements to foster compliance with international trade rules. These include monitoring provisions, reporting and notification requirements, the Trade Policy Review mechanism, and ultimately recourse to the Dispute Settlement Understanding (DSU). For a number of reasons, most analyses have focused on the incentives provided by the DSU, overlooking the other more subtle factors that were designed to discourage breaking rules. This focus has had a by-product that continues to influence discussions in the Doha Round, namely, that the strong provisions in the DSU appear to have made some WTO members wary of taking on additional obligations. Could non-DSU compliance mechanisms provide sufficient incentives to foster compliance with multilateral rules? Could a combination of the DSU and detailed reporting (transparency) requirements provide strong enough incentives?

The Uruguay Round Agreement on Government Procurement (URGPA) is a good vehicle with which to examine such matters, as it falls under the DSU and contains extensive reporting requirements on state purchasing decisions. We examine whether those compliance mechanisms were sufficient to prevent Japan from backsliding—that is, reducing foreign penetration of its central government procurement markets—during the slump of the 1990s, when there was considerable pressure on Japanese politicians to bolster domestic economic performance.¹ The recession prompted numerous initiatives by the central government to restart the economic growth engine that so impressed observers after World War II, initiatives that were often encouraged by domestic political interests.

A pertinent question is whether the measures taken discriminated against foreign firms. Many measures—such as the expansion of the monetary stock—were not implemented in a discriminatory manner. But what about government procurement practices? Was there any systematic reduction in the proportion of contracts awarded to foreign firms? Or were the disciplines of the URGPA sufficiently strong that foreign penetration of Japanese procurement markets was preserved?

This chapter examines Japanese submissions to the General Agreement on Tariffs and Trade (GATT) and the WTO about government procurement practices during the 1990s. To the best of the authors' knowledge, this is the first such analysis of Japan's—or indeed any country's—submissions on government procurement after the URGPA came into effect. The chapter compares selected aspects of Japanese government procurement of goods before and after the signing of the URGPA.

The findings are disquieting. First, even after the signing of the URGPA, at most a quarter of Japanese government procurement that fell under its disciplines involved contracts whose value exceeded agreed-on thresholds and did not make use of limited tendering techniques. Moreover, only about 6 percent of the value of such contracts was awarded to non-Japanese firms.

Second, the observed intertemporal changes in Japanese government procurement patterns suggest that foreign market access was eroded in the late 1990s, after nearly a decade of economic stagnation in Japan. The proportion of goods and services that were supplied in contracts above agreed-on thresholds was lower in 1999 than in 1997, resulting in a 0.8 billion special drawing right (SDR) shift of expenditures below URGPA-specified thresholds in 1999.² Furthermore, the probability of a foreign firm winning a contract from the Japanese government in 1998–99 was lower than in 1990–91. Taken together, both of these changes reduced the total value of contracts awarded to foreign firms. In fact, in the absence of these changes, it is estimated that in 1998–99 foreign firms would have won additional contracts worth a quarter more than they actually did. This erosion of foreign access to the Japanese government procurement market in the late 1990s calls into question the strength of existing WTO disciplines on government procurement.

This remainder of this chapter is organized as follows. The next section describes the reporting that the URGPA requires of signatories and describes the extent of compliance with these strictures. Section 2 describes and analyzes Japanese submissions on government procurement outcomes during the 1990s. Section 3 outlines implications for future research and for policy makers.

12.1 Reporting Requirements in the WTO's Agreement on Government Procurement

The URGPA is a plurilateral agreement of the WTO, to which 37 contracting parties are signatories. Article XIX:5 pertains to statistical submissions made by the

contracting parties to the Committee on Government Procurement.³ Since the mid-1990s, only 5 of the 37 contracting parties— Hong Kong (China), Japan, Norway, Switzerland, and the United States—have regularly made these submissions (table 12A.1). All of these five parties except Hong Kong (China) have made these submissions electronically since 1997.⁴ Only Norway made a submission every year between 1990 and 1999.

The current Agreement on Government Procurement (GPA) came into effect January 1, 1996. For this reason, the period under study was divided into two sub-periods, 1990–95 and 1997–99, in order to examine the operation of the previous GPA with the current URGPA and to draw conclusions from the comparison. The previous GPA was negotiated during the Tokyo Round of Trade Negotiations (1973–79) and came into force January 1, 1981. It was amended in 1987, with the amended version entering into force in 1988. The URGPA, negotiated in parallel with the Uruguay Round, extended the scope and coverage of the Tokyo Round Agreement to include services and more procuring entities.⁵ Unlike the 1987 protocol that amended the Tokyo GPA, the URGPA was a new text that superseded its predecessor. The GPA under the Tokyo Round applied annually to a total value of contracts of about \$30 billion during 1990–94; under the URGPA the value of procurement open to international competition is estimated to have increased to about \$300 billion (Hoekman and Mavroidis 1997).

There are many similarities between the statistical reporting requirements of the URGPA and the Tokyo Round GPA. Article XIX:5 of the URGPA corresponds to Article VI:9 of the Tokyo Round GPA and to Article VI:10 after the 1987 protocol. Article XV:1 of the URGPA, which pertains to circumstances under which procuring entities may resort to limited tendering, corresponds to Article V:15 in the Tokyo Round GPA and to Article V:16 after the 1987 protocol. Given this chapter's focus on Japanese government procurement outcomes in the 1990s, the relevant comparison is between the data submitted under the GPA after the 1987 protocol and the data submitted under the URGPA. Fortunately, the relevant articles in both versions have almost identical data requirements for statistical submissions.⁶

Before the completion of the negotiations on the URGPA, the scope of the GPA was limited to goods and to those services that were incidental to the procurement of such goods. With the Uruguay Round, the scope of the GPA was expanded to explicitly incorporate services (including construction services). As a result, data from before 1996 refer to goods alone, while data from after 1996 often cover both goods and services.⁷ This constrains the ability to compare Japanese government procurement before and after the URGPA came into force.⁸

In general, the URGPA necessitates that only government procurement above certain specified thresholds be subject to international competitive bidding, as long as such procurement is not covered by provisions allowing for limited tendering or derogations. The reporting requirements in the URGPA reflect the fact

that not all above-threshold procurement is open to unimpeded competition from foreign firms. Article XIX:5(a) of the URGPA requires the submission of information on the value of contracts awarded both above and below the threshold. Article XIX:5(b) requires data on procurement above the threshold to be classified by procuring entities and by goods and services according to the nationality of the winning supplier, irrespective of whether the supplier is located in a contracting party to the GPA.⁹ Data also need to be provided on the use of limited tendering practices broken down by entity and by category of goods and services (Article XIX:5[c]) and on derogations from the principles of most favored nation and national treatment (Article XIX:5[d]). Moreover, all of this information needs to be provided for each entity listed in annex 1 (central government entities), annex 2 (subcentral government entities), and annex 3 (all other entities procuring in accordance with the provisions of the URGPA such as utilities for instance) of a contracting party's commitments under the URGPA. Only the submissions by Norway and the United States provide data on all of the relevant entities. Information is consistently available only for annex 1 entities.

The 1987 protocol required reporting data on central government entities alone, and only goods were covered. The data requirements in clauses (a) and (b) of Article XIX:5 of the Uruguay Round GPA are essentially the same as those in Article VI:10(a) and (b) of the 1987 protocol. But Article VI:10 (c) of the 1987 protocol, pertaining to limited tendering, did not go as far as the URGPA's Article XIX:5(c) in requiring that the country of origin of the product also be reported. Similarly, since annex 1 entities were the only ones included in the 1987 protocol, Article VI:10(d) required only that data on derogations be provided as contained in annex 1; Article XIX: 5(d) of the URGPA extends this requirement to all relevant annexes. In both cases these derogations are specified in the General Notes to the Schedules of Parties in appendix I to the GPA.

The URGPA's requirement of international competitive bidding does not apply to all procurement of the covered entities. Coverage depends on whether the value of the procurement is at or above a certain threshold value. Thresholds differ depending on the type of procurement and the level of government making the purchase, stated in SDRs.¹⁰ For annex 1 central government entities, the threshold values are SDR 130,000 for procurement of goods and services and SDR 5 million for procurement of construction services. For annex 2 subcentral government entities, the thresholds are SDR 200,000 for goods and services (except for Canada and the United States, for which the threshold is SDR 355,000) and SDR 5 million for construction services (except for Japan and the Republic of Korea, for which the threshold is SDR 15 million). For annex 3 entities, the threshold values are SDR 400,000 for goods and services (except for the United States, for which the threshold is \$250,000 for federally owned utilities) and SDR 5 million for construction

services (except for Japan and Korea, for which the threshold is SDR 15 million). Annexes of individual signatories may specify higher thresholds for particular contracting parties in a bid to ensure reciprocity.¹¹

Exceptions from the obligations of the agreement are allowed for developing countries in certain situations outlined in Article V of the URGPA.¹² General exceptions are contained in Article XXIII and refer to actions taken to protect national security interests, public morals, order, or safety; human, animal, or plant life; health or intellectual property or relate to the production of goods or services by people with handicaps, philanthropic institutions, and prisoners.¹³

As for the methods of procurement, the URGPA allows the use of open, selective, and limited tendering procedures, in decreasing order of preference. Under open tendering, all interested suppliers may submit a tender (Article VII:3[a]). Under selective tendering, only suppliers that have been invited by the procuring entity to submit a tender may do so (Articles VII:3[b] and X). Under limited tendering, the procuring entity contacts each supplier individually (Article VII:3[c]). Article XV of the URGPA prescribes the circumstances in which a procuring entity may resort to limited tendering through a series of 10 clauses to this article.¹⁴

The 1987 protocol did so using five clauses under Article V:16. The first five clauses of the articles under the URGPA and the 1987 protocol are essentially the same, with the proviso that the URGPA takes account of the inclusion of services and makes recourse to limited tendering possible under clause (b) “for works of art or for reasons connected with protection of exclusive rights . . . or in the absence of competition for technical reasons.” Clauses (f)–(j) in Article XV allow for the use of limited tendering procedures for additional construction services, new construction services, “products purchased on a commodity market,” “purchases under exceptionally advantageous conditions which only arise in the very short term,” and “contracts awarded to the winner of a design contest.”

12.2 Japanese Submissions to the WTO on Government Procurement

This section describes the principal findings of an analysis of Japan’s submissions to the WTO concerning its central government purchases in 1990, 1991, 1997, 1998, and 1999.¹⁵ Data for 1997–99 were studied because they include the full set of Japan’s submissions about procurement decisions since the implementation of the URGPA. The data for 1990–91 provide a benchmark for the submissions for 1997–99.

For 1997, 1998, and 1999, table 12.1 reports for 31 state entities the total value of their transactions whose value was above and below the relevant URGPA–specified thresholds, transactions whose value was above the relevant

TABLE 12.1 Value of Reported Contracts Awarded by Japanese Government, 1997–99 (millions of SDR)

Procuring entity	Goods and services					
	1997			1998		
	Above and below threshold	Above threshold	Above threshold and limited tendering	Above and below threshold	Above threshold	Above threshold and limited tendering
House of Representatives	39.5	14.0	9.2	48.0	27.6	22.5
House of Councillors	19.2	0.6	0.2	13.9	4.2	2.4
Supreme Court	109.9	31.0	22.2	63.4	7.8	5.1
Board of Audit	3.3	1.3	0.6	2.5	0.7	0.6
Cabinet	5.7	1.3	0.7	2.5	0.8	0.8
Prime Minister's Office	54.7	42.2	32.6	50.4	46.2	39.4
Fair Trade Commission	2.7			2.1		
National Police Agency	209.9	111.2	11.5	385.7	305.4	20.4
Environmental Disputes Coordination	0.3	0.1	0.1	0.0	—	—
Financial Supervisory Agency	—	—	—	4.3	4.2	4.2
Imperial Household Agency	24.2	1.3	0.2	16.8	1.0	0.7
Management and Coordination Agency	44.6	35.3	13.4	22.2	11.5	2.8
Hokkaido Development Agency	3,800.7	268.0	5.6	4,185.3	332.6	29.1
Defense Agency	1,992.7	522.6	175.9	2,646.1	561.1	161.6
Economic Planning Agency	6.0	5.3	5.3	13.0	8.0	4.4
Science and Technology Agency	139.9	54.6	3.7	176.5	57.3	1.7
Environment Agency	47.0	15.4	15.2	107.3	19.1	17.5
Okinawa Development Agency	266.0	64.5	1.0	0.8	—	—
National Land Agency	21.1	17.9	13.1	29.4	21.3	16.1
Ministry of Justice	902.9	140.8	51.2	401.5	247.3	206.6
Ministry of Foreign Affairs	28.9	19.3	14.9	19.5	11.7	9.3
Ministry of Finance	1,095.9	675.0	364.5	976.6	665.1	353.6
Ministry of Education	3,324.6	1,624.0	166.7	4,004.0	1,844.5	216.0
Ministry of Health and Welfare	2,366.4	582.9	177.5	2,382.0	550.4	199.6

TABLE 12.1 (Continued)

Goods and services			Goods					
1999			1997		1998		1999	
Above and below threshold	Above threshold	Above threshold and limited tendering	Above threshold	Above threshold and limited tendering	Above threshold	Above threshold and limited tendering	Above threshold	Above threshold and limited tendering
56.9	28.2	19.3	9.1	5.8	6.2	5.6	6.5	6.3
27.5	4.2	3.6	0.1	0.0	2.3	0.8	1.1	0.7
183.2	91.6	7.1	8.8	2.3	3.7	3.6	9.7	5.3
4.9	2.2	1.4	0.8	0.2	0.0	0.0	1.3	0.7
3.1	1.8	1.0	0.9	0.2	0.1	0.1	0.7	0.0
53.2	50.3	37.1	8.5	7.8	9.6	9.1	8.3	7.6
1.9	0.0	—	—	—	—	—	0.0	—
275.9	182.1	39.7	110.4	10.6	302.6	20.0	182.1	39.7
0.1	—	—	0.1	0.1	—	—	—	—
6.2	4.2	4.2	—	—	0.0	0.0	0.3	0.3
21.6	1.5	0.7	1.3	0.2	1.0	0.7	0.4	0.4
26.9	16.6	5.8	24.8	11.4	2.3	0.5	3.0	0.3
3,599.1	492.1	4.1	48.2	0.6	36.3	0.0	37.3	0.0
1,721.7	275.2	45.5	65.2	11.9	49.2	8.7	46.9	10.0
25.5	21.3	8.9	5.3	5.3	7.5	3.9	8.5	7.1
237.2	116.3	21.7	53.9	3.7	55.1	1.7	83.5	21.5
93.3	14.9	7.6	9.0	8.9	11.4	10.2	9.6	2.7
2.8	1.1	0.9	5.1	0.5	—	—	0.2	0.0
22.9	18.6	12.5	7.2	2.4	5.2	0.3	6.2	0.0
431.1	230.3	163.7	54.2	42.6	147.9	128.8	85.4	77.2
18.6	12.3	10.0	14.2	10.1	6.9	5.1	7.3	5.8
883.0	591.6	349.7	168.4	31.9	407.6	272.5	418.9	284.0
6,000.2	2,366.7	387.0	1,115.7	100.7	1,337.9	165.1	1,489.4	212.5
2,006.2	361.3	68.8	221.5	52.4	222.4	30.3	186.1	33.8

(continued on the next page)

TABLE 12.1 (Continued)

Procuring entity	Goods and services					
	1997			1998		
	Above and below threshold	Above threshold	Above threshold and limited tendering	Above and below threshold	Above threshold	Above threshold and limited tendering
Ministry of Agriculture, Forestry and Fisheries	2,689.2	811.0	270.5	2,388.0	475.7	206.8
Ministry of International Trade and Industry	162.2	64.7	34.0	2,41.5	102.4	41.5
Ministry of Transport	3,103.4	1,545.6	346.3	2,808.4	1,322.4	306.5
Ministry of Posts and Telecommunications	4,312.6	3,232.3	997.7	3,703.1	2,759.8	724.5
Ministry of Labour	200.8	149.7	147.6	180.3	144.9	135.6
Ministry of Construction	10,708.7	3,092.2	745.0	12,257.6	3,796.8	922.9
Ministry of Home Affairs	5.8	1.5	1.3	16.7	8.4	8.2
Total	35,688.7	13,125.7	3,627.9	37,149.4	13,338.2	3,660.3

Source: Author's calculations.

URGPA-specified thresholds, and transactions whose value exceeded the relevant URGPA-specified thresholds and included some form of limited tendering. Data for goods transactions are broken out from data on goods and services transactions.

As the last line of table 12.1 shows, total spending reported to the WTO fluctuated around 36 billion SDRs between 1997 and 1999. Total expenditures above the threshold fell from 13.1 billion SDRs in 1997 to 11.7 billion SDRs in 1999, a reduction of 11.0 percent. The total value of above-threshold spending that employed limited tendering fell from 3.6 billion SDRs in 1997 to 2.9 billion SDRs in 1999, a contraction of 21.7 percent. Total spending on goods above the threshold fell between 1997 and 1999. However, spending on goods above the threshold that also involved the use of limited tendering rose from 826.4 million SDRs in 1997 to 1.1 billion SDRs in 1999.

More disaggregated data on Japanese procurement reveal that 10 procuring entities accounted for more than 95 percent of the Japanese government's total purchases in 1998 and 1999 (table 12.2). The 10 procuring entities are, in decreasing order of their share of total reported expenditures, the Ministry of Construction; the Ministry of Education; the Hokkaido Development Agency; the Ministry

TABLE 12.1 (Continued)

Goods and services			Goods					
1999			1997		1998		1999	
Above and below threshold	Above threshold	Above threshold and limited tendering	Above threshold	Above threshold and limited tendering	Above threshold	Above threshold and limited tendering	Above threshold	Above threshold and limited tendering
2,138.2	493.1	181.0	26.9	14.7	26.2	11.0	64.2	14.2
249.0	93.8	40.6	55.2	28.6	90.6	32.8	71.3	20.8
2,647.6	1,111.8	191.1	501.2	148.9	465.2	196.0	449.9	119.8
2,728.1	1,860.9	510.4	1,903.0	166.4	1,879.7	140.9	1,060.2	91.0
169.4	131.9	129.0	116.5	115.0	108.1	100.5	103.4	101.3
12,623.5	3,087.4	575.7	207.8	42.9	152.9	27.8	216.8	31.3
18.3	15.2	10.8	0.3	0.1	0.9	0.7	4.6	0.1
36,277.2	11,678.4	2,839.5	4,743.5	826.4	5,338.8	1,176.8	4,563.0	1,094.4

Source: WTO documents referred to in text.

Note: — = not available.

of Posts and Telecommunications; the Ministry of Transport; the Ministry of Agriculture, Forestry and Fisheries; the Ministry of Health and Welfare; the Defense Agency; the Ministry of Finance; and the Ministry of Justice. In 1998–99 these 10 procuring entities accounted for 96.1 percent of reported contracts above and below the relevant thresholds and 89.3 percent of reported contracts that were above URGPA-specified thresholds in which limited tendering was employed. Three entities (the Ministry of Construction, the Ministry of Education, and the Hokkaido Development Agency) accounted for almost 60 percent of reported spending above and below the relevant URGPA-specified thresholds. Four entities (the Ministry of Construction, the Ministry of Posts and Telecommunications, the Ministry of Education, and the Ministry of Transport) accounted for more than 70 percent of reported contracts above the threshold. Three entities (the Ministry of Construction, the Ministry of Posts and Telecommunications, and the Ministry of Education) accounted for more than half of the contracts that employed limited tendering and whose contractual value exceeded URGPA-specified thresholds. These findings highlight the high degree of concentration of Japanese government procurement expenditures that are subject to the disciplines of the URGPA.

TABLE 12.2 Reported Procurement by 10 Largest Japanese Government Procuring Entities, 1998 and 1999
(percent of total)

Procuring entity	Total reported contracts above and below the threshold	Total reported contracts above the threshold	Total reported contracts above the threshold for which limited tendering was used	Above the threshold	Above the threshold and not subject to limited tendering
Ministry of Construction	33.9	27.5	23.1	27.7	21.6
Ministry of Education	13.6	16.8	9.3	42.1	36.1
Hokkaido Development Agency	10.6	3.3	0.5	10.6	10.2
Ministry of Posts and Telecommunications	8.8	18.5	19.0	71.8	52.6
Ministry of Transport	7.4	9.7	7.7	44.6	35.5
Ministry of Agriculture, Forestry and Fisheries	6.2	3.9	6.0	21.4	12.8
Ministry of Health and Welfare	6.0	3.6	4.1	20.8	14.7
Defense Agency	5.9	3.3	3.2	19.1	14.4
Ministry of Finance	2.5	5.0	10.8	67.6	29.8
Ministry of Justice	1.1	1.9	5.7	57.4	12.9
Total	96.1	93.6	89.3	n.a.	n.a.

Source: WTO documents referred to in text.

Note: n.a. = not applicable.

The percentage of contracts above the threshold varies across the 10 largest procuring entities, ranging from 10.2 percent (for the Hokkaido Development Agency) to 71.8 percent (for the Ministry of Posts and Telecommunications). Given that limited tendering procedures are often used to exclude foreign firms from bidding for government contracts, it is instructive to calculate the percentage of the total value of a procuring entity's contracts that are both above the threshold and do not involve limited tendering. If limited tendering procedures are indeed used to prevent foreign firms from bidding for contracts, this percentage provides an upper bound on the percentage of the total value of a procuring entity's contracts open to international competitive bidding. This is because some of the contracts that are above the threshold and do not involve limited tendering may fall under derogations to the URGPA that Japan negotiated.

TABLE 12.3 Proportion of Reported Japanese Procurement That Is Both above GPA Thresholds and Not Subject to Limited Tendering, 1998 and 1999

Item	Ten largest procuring entities	All procuring entities
Below threshold	0.668	0.659
Above threshold and subject to limited tendering	0.082	0.089
Above threshold and not subject to limited tendering	0.250	0.252

Source: WTO documents referred to in text.

The upper bounds for the 10 largest state procuring entities in Japan are reported in the last column of table 12.2. In only one procuring entity—the Ministry of Posts and Telecommunications—did the (maximum) percentage of contracts that was effectively open to international competitive bidding in 1998–99 exceed 50 percent—and then only barely (52.6 percent.) The three largest procuring entities, which together account for almost 60 percent of total Japanese procurement that falls under the disciplines of the GPA, put at most 36.1 percent of their contracts out for international competitive bidding.

Table 12.3 summarizes the main findings of tables 12.1 and 12.2. On average during 1998–99, no more than 25.2 percent of the value of Japanese procurement contracts covered by URGPA disciplines were subject to international competitive bidding. That is, less than 9.5 billion SDRs (\$12.5 billion) in contracts was put up for international competitive bidding in which foreign firms could potentially compete on terms that did not *de jure* discriminate in favor of their Japanese rivals. Given that some of these contracts are likely to involve derogations from the URGPA, it is likely that less than a quarter of reported Japanese government procurement expenditures could be openly competed for from abroad. This finding suggests that the liberalization of procurement practices in Japan probably has a long way to go.

Only a fraction of Japan's government procurement market is potentially contestable by foreign firms. However, if that proportion were rising or even constant, it might suggest that the URGPA has at a minimum preserved the extent of foreign market access. This could be seen as an accomplishment, since Japan's prolonged slump is bound to have increased pressures on domestic politicians to "protect" both domestic jobs and firms by increasing the domestic firms' share of government contracts. Unfortunately, figure 12.1 presents evidence to the contrary. Between 1997 and 1999, the percentage of Japanese government contracts

Figure 12.1 Proportion of Reported Japanese Procurement of Goods and Services above GPA Threshold, 1997–99

Source: WTO documents referred to in text.

that were clearly potentially contestable by foreign firms through international competitive bidding fell from 26.6 percent to 24.4 percent. This decline means that the value of contracts that foreigners can contest has fallen by more than 0.8 billion SDRs (more than \$1 billion.) On this metric, it is difficult to argue that the URGPA has preserved foreign access to Japanese government procurement markets during a period of acute economic pain. This is the first piece of evidence indicating that the URGPA has failed to perform under pressure.

Table 12.4 shows the average percentage of the total value of each procuring entity's above-threshold purchases on services that were awarded to foreign firms during 1998–99.¹⁶ A comparable percentage for goods procurement is also reported. Across all procuring entities, only 1.4 percent of the value of total above-threshold services contracts were awarded to foreign firms. For goods procurement, the comparable percentage is almost 10 times greater, at 13.4 percent. These mean values mask considerable variation across procuring entities. For example, the percentage of services sourced abroad ranged from 0 to 66.6 percent, while the percentage of goods sourced from overseas ranged from 0 to 74.2 percent.

The variation in foreign sourcing is far less pronounced among the 10 largest procuring entities. For services the maximum percentage of foreign sourcing by these 10 entities is 7.3 percent, the minimum percentage 0, and the mean 1.1 percent. The comparable percentages for goods are 0.9 percent, 28.2 percent, and 13.1 percent. Taking goods and services together, foreign firms won contracts on

TABLE 12.4 Foreign Sourcing of Services and Goods in Japan, 1998–99

Procuring entity	Above-threshold procurement of services		Above-threshold procurement of goods	
	Annual average total value (millions SDR)	Percentage awarded to foreigners	Annual average total value (millions SDR)	Percentage awarded to foreigners
Ministry of Construction	3,257.3	0.15	184.8	1.85
Ministry of Posts and Telecommunications	840.4	5.21	1,469.9	6.26
Ministry of Education	691.9	0.99	1,413.6	24.83
Ministry of Transport	759.5	0.21	457.6	10.92
Ministry of Finance	215.1	0.37	413.3	1.55
Ministry of Agriculture, Forestry and Fisheries	439.2	0.00	45.2	21.12
Ministry of Health and Welfare	251.6	7.25	204.3	28.18
Defense Agency	370.1	0.00	48.0	9.25
Hokkaido Development Agency	375.5	0.00	36.8	0.86
National Police Agency	1.4	0.00	242.4	7.00
Ministry of Justice	122.1	0.00	116.7	0.60
Ministry of Labour	32.6	66.55	105.8	21.94
Ministry of International Trade and Industry	17.1	5.21	81.0	29.85
Science and Technology Agency	17.5	0.94	69.3	21.66
Supreme Court	42.9	0.35	6.7	0.00
Prime Minister's Office	39.3	0.00	8.9	0.00
House of Representatives	21.6	26.47	6.3	4.88
National Land Agency	14.3	0.00	5.7	74.21
Environment Agency	6.5	0.00	10.5	38.50
Economic Planning Agency	6.7	0.00	8.0	0.00
Management and Coordination Agency	11.4	1.98	2.6	3.54
Ministry of Foreign Affairs	4.9	1.89	7.1	4.12
Ministry of Home Affairs	9.1	0	2.7	5.30
House of Councillors	2.5	0	1.7	0
Financial Supervisory Agency	4.1	0	0.1	0

(continued on the next page)

TABLE 12.4 (Continued)

Procuring entity	Above-threshold procurement of services		Above-threshold procurement of goods	
	Annual average total value (millions SDR)	Percentage awarded to foreigners	Annual average total value (millions SDR)	Percentage awarded to foreigners
Board of Audit	0.8	0	0.7	0
Cabinet	0.8	0	0.4	0
Imperial Household Agency	0.5	0	0.7	0
Okinawa Development Agency	0.5	0	0.1	0
Fair Trade Commission	0	—	0	0
National Public Safety Commission				0
Environmental Disputes Coordination	0	—	—	0
All procuring entities	7,557.4	1.39	4,950.9	13.41

Source: WTO documents referred to in text.

Note: — = not available.

above-threshold procurement worth 6.1 percent of the total value of all above-threshold procurement reported by Japan to the WTO. This implies that in 1998 and 1999, the value of Japanese government contracts won by foreign firms was just under a quarter of the value of those Japanese government contracts that, according to the URGPA, should be put out for international competitive bidding (6.1 percent divided by 25.2 percent). This finding suggests that when foreign firms were given the chance to compete for Japanese government contracts, they won a significant proportion of them, suggesting that the competitiveness of foreign bidders is not the constraint on their penetration of Japanese state purchasing markets.

How has the percentage of contracts awarded to foreign firms by Japanese government procuring entities changed over time? Japanese submissions on goods procurement in 1990–91 can be compared with the figures for 1998–99 in two ways: by comparing the number of contracts awarded to foreign firms (table 12.5) and by comparing the value of contracts awarded to foreign firms (table 12.6). Of the 53 procuring entities in Japanese submissions throughout the 1990s, data on above-threshold goods procurement are available for both periods for 21. All of

the largest procuring entities report such data in both periods, so little is lost by focusing on these 21 procuring bodies.¹⁷

Table 12.5 reports the total number of goods contracts awarded above the threshold, the number of these contracts awarded to foreign bidders, and the number of above-threshold contracts in which limited tendering procedures were used. Two test statistics are computed for each procuring entity. The first (reported in column 10) provides evidence on whether the (null) hypothesis that the proportion of contracts awarded to foreigners in 1990–91 is the same as that in 1998–99 can be rejected in favor of an alternative hypothesis that the former proportion is greater than the latter. Values of this test statistic, which is normally distributed, above 1.645 indicate that there is a 95 percent or more chance that the true proportion of contracts awarded to foreign firms in 1998–99 is smaller than in 1990–91.¹⁸ The second test statistic (reported in column 13) evaluates the (null) hypothesis that the proportion of above-threshold contracts that do not involve the use of limited tendering in 1990–91 is the same as in 1998–99 can be rejected in favor of a (an alternative) hypothesis that the former proportion is greater than the latter.

In 1990–91 Japanese procuring entities issued 15,150 contracts above the threshold, of which 26.0 percent were awarded to foreign firms. Of these contracts, 91.5 percent did not involve the use of limited tendering procedures. In 1998–99 the number of contracts had risen to 18,456, the percentage awarded to foreigners had fallen to 23.9 percent, and the percentage of these contracts that did not employ limited tendering had dropped to 85.7 percent. These findings suggests that foreign access to Japanese government procurement markets fell during the 1990s. The relevant test statistic 1 in table 12.5 takes the value of 4.432, providing strong evidence in favor of the hypothesis that the true proportion of contracts awarded to foreign firms was lower at the end of the 1990s than at the beginning.

Table 12.5 also reveals that the 21 procuring entities saw statistically significant reductions in the proportion of contracts awarded to foreign firms (as evidenced by the value of test statistic 1 exceeding 1.645 for these entities.) Seven of these eight procuring entities were among the 10 largest procuring entities identified earlier. In fact, during 1998–99, 50 percent of the 18,456 above-threshold contracts awarded by all Japanese procuring entities were awarded by these eight procuring entities. In contrast, in only three procuring entities is there evidence of more foreign sourcing in 1998–99 compared with 1990–91 (the value of test statistic 1 is less than -1.645). These three procuring entities awarded only 357 contracts during 1998–99. The number of contracts issued in 1998–99 by procuring entities that had reduced the proportion of awards to foreign bidders far exceeded the number of contracts issued by entities that

TABLE 12.5 Foreign Contracts for Goods Awarded by Japanese Procuring Entities, 1990-91 and 1998-99

Procuring entity	Number of contracts awarded above the threshold					
	1991-99			1998-99		
	Total	Awarded to foreigners	Awarded through limited tendering	Total	Awarded to foreigners	Awarded through limited tendering
Ministry of Education	4,983	2,014	138	5,340	1,864	962
Ministry of Finance	521	70	39	548	30	113
House of Representatives	20	16	8	23	7	19
Ministry of Transport	733	190	169	803	150	220
Ministry of Construction	500	36	85	684	22	46
Ministry of Labour	54	18	50	69	10	56
Environment Agency	9	7	8	32	13	17
Ministry of Posts and Telecommunications	1,341	95	196	1,927	106	211
Ministry of Health and Welfare	3,777	1,033	203	6,714	1,758	538
Ministry of Foreign Affairs	20	1	20	39	1	29
Ministry of Justice	57	1	13	263	3	138
Science and Technology Agency	95	28	34	191	55	12
Ministry of International Trade and Industry	43	14	20	176	68	53
Ministry of Home Affairs	3	0	0	11	1	3
Defense Agency	1,131	47	62	741	43	49
Management and Coordination Agency	12	0	1	25	3	7
Ministry of Agriculture, Forestry and Fisheries	376	241	91	321	249	60
National Land Agency	8	0	3	11	7	1
Supreme Court	4	0	4	21	0	17
Prime Minister's Office	21	0	21	28	0	24
Economic Planning Agency	2	0	2	11	0	4
Total for procuring entities for which test statistic 1 is greater than 1.645	8,161	2,446	693	9,426	2,202	16,44
Total for procuring entities for which test statistic 1 is less than 1.645	396	241	95	357	259	68
Total for all of these procuring entities	13,710	3,811	1,167	17,978	4,390	2,579
Total for all procuring entities	15,150	3,944	1,293	18,456	4,416	2,637

TABLE 12.5 (Continued)

Proportion awarded to foreigners (percent)			Maximum proportion of unimpeded above-the-threshold procurement (percent)		
1990–91	1998–99	Test statistic 1	1990–91	1998–99	Test statistic 2
40	35	5.78	97	82	26.51
13	5	4.47	93	79	6.32
80	30	3.78	60	17	3.15
26	19	3.41	77	73	1.96
7	3	2.98	83	93	–5.31
33	14	2.45	7	19	–1.94
78	41	2.27	11	47	–2.61
7	6	1.82	85	89	–3.06
27	26	1.29	95	92	5.34
5	3	0.44	0	26	–3.67
2	1	0.33	77	48	4.67
29	29	0.12	64	94	–5.65
33	39	–0.76	53	70	–1.96
0	9	–1.05	1	73	2.03
4	6	–1.58	95	93	1.00
0	12	–1.85	92	72	1.64
64	78	–3.97	76	81	–1.78
0	64	–4.39	63	91	–1.48
—	—	—	0	19	–2.22
—	—	—	0	14	–2.16
—	—	—	0	64	–4.39
—	—	—	—	—	—
—	—	—	—	—	—
—	—	—	—	—	—
0.26	0.24	4.43	0.91	86	16.76

Source: WTO documents referred to in text.

Note: — = not available.

TABLE 12.6 Above-Threshold Goods Procurement by Japanese Entities, 1990–91 and 1998–99

Procuring entity	1990–91	
	Annual average total value (millions SDR)	Percentage awarded to foreigners
Ministry of Posts and Telecommunications	858.6	4.0
Ministry of Education	692.9	32.8
Ministry of Transport	268.8	7.9
Ministry of Finance	126.5	13.4
National Police Agency	—	—
Ministry of Health and Welfare	121.0	27.5
Ministry of Construction	91.7	4.8
Ministry of Justice	18.3	0.4
Ministry of Labour	75.3	25.6
Ministry of International Trade and Industry	6.0	48.3
Science and Technology Agency	80.5	20.0
Defense Agency	52.7	6.3
Ministry of Agriculture, Forestry and Fisheries	36.9	21.1
Hokkaido Development Agency	—	—
Environment Agency	1.4	4.8
Prime Minister's Office	10.2	0
Economic Planning Agency	2.3	0
Ministry of Foreign Affairs	2.8	3.3
Supreme Court	1.0	0
House of Representatives	3.5	10.8
National Land Agency	1.2	0
Ministry of Home Affairs	0.3	0
Management and Coordination Agency	6.1	0
House of Councillors	—	—
Imperial Household Agency	—	—
Board of Audit	—	—
Cabinet	—	—
Okinawa Development Agency	0.0	—
Fair Trade Commission	0.0	—
National Public Safety Commission	47.5	0.7
Total for all procuring entities	2,505.6	14.3

TABLE 12.6 (Continued)

1998–99		Change in value of foreign contracts in 1998–99 if the proportion of foreign sourcing had been as in 1990–91 (millions SDR)
Annual average total value (millions SDR)	Percentage awarded to foreigners	
1,469.9	6.3	–33.18
1,413.6	24.8	113.10
457.6	10.9	–13.66
413.3	1.6	48.91
242.4	7.0	—
204.3	28.2	–1.33
184.8	1.9	5.43
116.7	0.6	–0.21
105.8	21.9	3.85
81.0	30.0	14.95
69.3	21.7	–1.37
48.0	92.5	–1.41
45.2	21.1	–0.02
36.8	0.9	–0.32
10.5	38.5	0.97
8.9	0	0
8.0	0	0
7.1	41.2	–0.06
6.7	0	0
6.3	48.8	0.37
5.7	74.2	–4.20
2.7	5.3	–0.14
2.6	3.5	–0.09
1.7	0	—
0.7	0	—
0.7	0	—
0.4	0	—
0.1	0	0
0.0	0	—
—	—	—
4,950.8	13.4	131.6

Source: WTO documents referred to in text.

Note: — = not available.

Figure 12.2 Changes in Foreign Sourcing between 1990–91 and 1998–99

Source: WTO documents referred to in text.

purchased proportionally more from foreign firms than at the beginning of the 1990s (figure 12.2).

The last column of table 12.5 presents the test statistic for the maximum proportion of an entity's purchases subject to international competitive bidding. In eight entities, which awarded 13,702 of the 18,456 contracts in 1998–1999, the value of test statistic 2 exceeds 1.645. This finding supports the contention that the proportion of above-threshold procurement contracts in Japan subject to international competitive bidding fell after the implementation of the URGPA. Figure 12.3 summarizes the main findings, reinforcing the impression that foreign access to the Japanese government procurement market has contracted over time.

The differences over time in the propensity of procuring bodies to source from foreign firms, in particular the fact that some bodies sourced more from abroad in 1998–99 than in 1990–91, suggest that a common factor—perhaps poor macro-economic performance—cannot entirely account for the observed variation in procuring propensities. Something else must be going on. A possible explanation is that some procuring agencies—in particular, those offering a substantial number of contracts—may have taken steps to divert contracts to local suppliers in order to stimulate certain sectors of the Japanese economy. Such steps may have come as a result of direct instructions or more subtle suggestions from Japanese politicians.

In addition to comparing the proportion of contracts awarded to foreign firms, one can compare the share of the total value of each procuring entity's above-threshold purchases of goods that was spent on foreign firms in the early and the late 1990s (table 12.6). For 30 procuring entities, it was possible to

Figure 12.3 Changes in Unimpeded Procurement between 1990–91 and 1998–99

Source: WTO documents referred to in text.

calculate the share of above-threshold goods procurement awarded to foreign firms in either 1990–91 or 1998–99. For 23 such entities these shares could be calculated for both sets of years.

In 7 of the 23 entities, the share of contracts awarded to foreign firms was higher in 1990–91 than in 1998–99. In 13 procuring entities the shares were higher in 1998–99, but the expansion of their market access was offset by the falling shares in the other entities. To demonstrate this, we calculated what would have been the value of contracts awarded to foreign firms by each procuring entity in 1998–99 had the shares of contracts awarded to foreign firms taken their 1990–91 values. Across the 23 procuring entities, the reduction in market access equals 131 million SDRs a year, or 17.1 percent of the 769.1 million SDRs spent on above-threshold contracts awarded to foreign firms in 1998–99.

To recap, in table 12.1 evidence was presented that the proportion of Japanese government procurement falling below GPA-specified thresholds fell between 1997 and 1999. Of the goods contracts awarded above the threshold, the evidence presented in table 12.6 demonstrates that the average share of contracts awarded to foreign firms was lower in 1998–99 than in 1990–91. Both changes imply that foreign market access in 1998–99 was almost certainly smaller than it was earlier. Shifting more government procurement below GPA-specified thresholds resulted in an annual average reduction of foreign contracts of 61.1 million SDRs.

Table 12.7 presents estimates of the increase in foreign access to the Japanese government procurement market in the absence of the two changes described

TABLE 12.7 Estimated Loss of Foreign Access to Japanese Government Procurement Market, 1998–99
(millions of SDR)

Item	Value
Reported foreign contracts 1998–99	769.1
<i>Additional foreign contracts in absence of</i>	
Lower probability of awarding contract	131.6
above relevant thresholds to foreigners	
Lower proportion of contracts above	61.1
thresholds	
<i>Total reduction in foreign market access</i>	192.7 ^a
<i>in Japanese procurement market, 1998–99</i>	
Percentage of reported	25.0
foreign contracts	

Source: WTO documents referred to in text.

Note: a. Equal to 25 percent of reported foreign contracts.

above. For 1998–99 the annual average increase in the value of foreign contracts would have been 192.7 million SDRs, equivalent to a quarter of the actual value of annual foreign contracts awarded by Japanese government agencies in this period. This reinforces the earlier finding that the URGPA did not perform well under pressure—that is, that during the prolonged downturn in the 1990s it did not dissuade the Japanese government from taking steps that effectively reduced the potential value of contracts awarded to foreign firms.

These findings were confirmed by an econometric analysis that is not reported here. After stripping out the variation created by traditional macroeconomic variables (inflation, economic growth, exchange rates, and so forth) and using several proxies for the ability of Japanese firms to win state contracts at home, we examined whether the signing of the URGPA had a (level) effect on the value of goods sourced abroad by more than 30 Japanese government agencies. In no econometric specification did we find a positive estimate of the effect of the URGPA (let alone a statistically significant positive estimate). A more sophisticated statistical analysis thus confirms the principal finding of this chapter.

The above findings do not necessarily imply that Japan violated the URGPA disciplines. It could be that it merely shifted the composition of its government spending toward goods and services that happen to fall below GPA-specified thresholds—a category in which domestic firms have a distinct advantage in winning government contracts—thus adhering to the letter of the URGPA. Whatever the motivation, the systematic reductions in the value of contracts awarded to foreign firms will undermine foreign support for procurement reform, however, and for international trade reform more generally.

12.3 Concluding Remarks

Japan's recent procurement patterns provide a useful prism through which to evaluate the performance of the URGPA, as Japan's prolonged slump in the 1990s undoubtedly increased the pressure on its political leaders to "save" domestic jobs and firms. The analysis should be of particular interest to policy makers in developing countries, as it suggests that there are still considerable opportunities to expand market access in the WTO members that have the largest procurement markets (the industrial economies).

The evidence presented in this chapter is disquieting. The pattern of reported Japanese procurement is such that more contracts fell below URGPA-specified thresholds in 1999 than in 1997. Moreover, of those contracts that remained above the threshold, a smaller proportion was awarded to foreign firms in 1998–99 than in 1990–91. In the absence of these changes, foreign firms would have won contracts worth a quarter more than they actually did in 1998–99, implying that a sizable reduction in foreign market access occurred during the 1990s. These findings are particularly disappointing given the numerous aspects of the URGPA—such as the establishment of domestic bid challenge procedures—that were supposed to preserve and protect the rights of actual and potential foreign bidders.

Perhaps the most important lesson of the Japanese experience in the 1990s is that multiple-step procurement procedures offer many opportunities for *de facto* discrimination against foreign bidders for state contracts and that these opportunities can be readily exploited by governments that are under pressure to improve domestic economic performance. Trade agreements that both enhance transparency and reduce *de jure* discrimination, such as the URGPA, do not eliminate all possibilities for excluding foreign bidders.¹⁹ This finding has broader implications for monitoring implementation of multilateral trade agreements, especially those with substantial regulatory content. It seems that the combined effect of extensive reporting (transparency) requirements and recourse to the Dispute Settlement Understanding did not preserve foreign market penetration of the Japanese state procurement market during the 1990s. If this is the case, attention will be needed to structuring incentives that foster compliance that are not at the same time too burdensome on WTO members. It seems that the balance between compliance mechanisms in the current GPA is not quite right and that the agreement may therefore not be a good model for future agreements.

Notes

1. During the 1990s the average rate of annual gross domestic product (GDP) growth was 1.7 percent. During the 1980s annual growth averaged 3.7 percent.

2. Japanese submissions to the WTO on government procurement expenditures tend to be reported in special drawing rights, the unit of account employed at the International Monetary Fund.

All financial values reported in this chapter are converted into 2000 prices. For reference, in December 2000 one SDR was worth 1.28975 U.S. dollars.

3. Each of the 25 members of the European Union is considered a separate contracting party.

4. The United States and Switzerland have done so for 1996 as well.

5. The new GPA was negotiated mainly within the Committee on Government Procurement and pursuant to the authorization of the code itself, in Article IX:9. The negotiations were thus not formally a part of the Uruguay Round, but were launched by a ministerial declaration and conducted within certain negotiating groups.

6. The only difference is that the Tokyo Code included procurement by central government entities only, while the Uruguay Code incorporated procurement by all central, subcentral, and other government entities, such as utilities. Hence the relevant articles in the two codes necessitated data submissions from the respective covered entities. Interestingly, even this difference does not amount to much in the case of Japan and Switzerland, both of which submitted statistics on central government entities alone.

7. The issue of services in the GPA is interesting, because per the General Agreement on Trade in Services, services follow a positive list approach (that is, only services explicitly mentioned by contracting parties in appendix 1 of the GPA are covered by the agreement). Covered services are listed in annex 4 of the GPA, while construction services are listed in annex 5.

8. As noted below, the GPA requires that contracting parties submit data on the number and value of contracts awarded both above and below the threshold. Only above-threshold figures need to be classified as goods or services. This makes it difficult to examine how goods or services contracts awarded above the threshold have changed over time as a proportion of total goods or total services contracts.

9. The authors thank Mr. Robert Anderson, the official responsible for GPA matters at the WTO Secretariat, for confirming this point.

10. The dollar values used were set March 1, 2000, and remained valid until March 2002.

11. For instance, the threshold for construction services is SDR 5 million for U.S. firms and SDR 15 million for firms from Korea.

12. These exceptions can be made to safeguard a country's balance of payments position; promote the establishment or development of domestic industries, including the development of small-scale and cottage industries in rural or backward areas; or support industrial units, as long as they are wholly or substantially dependent upon government procurement.

13. According to the article, these measures should not be applied in a manner that represents a disguised restriction on international trade or constitutes arbitrary or unjustifiable discrimination between countries in which similar conditions prevail.

14. Nothing prevents a procuring entity from approaching a foreign firm to bid for a contract under limited tendering.

15. All expenditures have been converted to 2000 Japanese prices and are stated in SDRs. In December 2000 one SDR was worth on average \$1.28975.

The Japanese GDP wholesale price index was used to convert expenditures into 2000 prices.

16. The average is a weighted average that takes account of the fact that a procuring entity's spending on services in 1998 may differ from that in 1999.

17. In much of what follows, we compare differences over time in the propensity of a state procuring body to source from foreign firms. Such intertemporal comparisons may be inappropriate if there are changes in the responsibilities a state body has and therefore changes in the pattern and conduct of its procurement or if the composition of the procuring body's spending changes toward, or away from, goods for which there is a higher propensity to source from Japanese firms.

18. Formally, a one-tail test is being performed here on two computed proportions. The null hypothesis is that the true values of the proportions for the two periods are equal. The alternative hypothesis is that the value during the early 1990s exceeds the value in the late 1990s. The test statistic takes account of the fact that in neither case is the true value of the proportion observed.

19. A cynic might argue that such trade agreements merely rechannel discriminatory efforts to areas not covered by the agreement. Worse still, the reporting requirements of the URGPA may have resulted in pressure on officials in Japanese government agencies that were seen to be awarding "too many" or relatively more state contracts to foreign firms.

Reference

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ANNEX

TABLE 12A.1 Statistical Submissions Made to the Committee on Government Procurement, 1985–2000

Year	Reporting unit
1985	Austria, Canada, European Communities, Finland, Israel, Japan, Norway, Singapore, Sweden, Switzerland
1986	Canada, Finland, Hong Kong (China), Israel, Norway, Singapore, Sweden, Switzerland, United States
1987	Canada, Finland, Hong Kong (China), Israel, Norway, Singapore, Sweden, Switzerland, United States
1988	Canada, Finland, Hong Kong (China), Israel, Norway, Singapore, Sweden, Switzerland, United States
1989	Canada, Finland, Hong Kong (China), Israel, Norway, Singapore, Sweden, Switzerland, United States
1990	Austria, Canada, European Communities, Finland, Hong Kong (China), Israel, Norway, Singapore, Sweden, Switzerland, United States
1991	Austria, Canada, Finland, Hong Kong (China), Israel, Japan, Norway, Singapore, Sweden, Switzerland, United States
1992	Austria, Canada, European Communities, Finland, Hong Kong (China), Israel, Japan, Norway, Singapore, Sweden, United States
1993	Austria, Canada, Finland, Hong Kong (China), Japan, Norway, Singapore, Sweden, Switzerland, United States
1994	Austria, Finland, Hong Kong (China), Norway, Singapore, Sweden, Switzerland
1995	Hong Kong (China), Norway, Switzerland
1996	Canada, Hong Kong (China), Norway, Switzerland, United States
1997	Hong Kong (China), Japan, Norway, Switzerland, United States
1998	Hong Kong (China), Japan, Norway, Switzerland, United States
1999	Hong Kong (China), Japan, Norway, Switzerland, United States
2000	Hong Kong (China)

Source: Statistical submissions made to the WTO Committee on Government Procurement 1985–2000.

Note: Statistical submissions are accessible electronically for all reporting countries for 1997–1999 except Hong Kong (China). Electronic versions are also available for Switzerland and the United States for 1996.

See: http://www.wto.org/english/tratop_e/gproc_e/gproc_e.htm.

THE CASE FOR TRADABLE REMEDIES IN WTO DISPUTE SETTLEMENT

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It has been four years since the process leading to the reform of the Dispute Settlement Understanding (DSU) was initiated. The Ministerial Conference in Doha provided the legal mandate to do so. Negotiations started in early March 2002 and were supposed to be concluded by the end of May 2003. They were not. The situation is ambiguous from a purely legal perspective: negotiators seem to take the view that although the deadline for concluding negotiations has lapsed, they still have the mandate to continue negotiating, which is what they have been doing ever since.

The negotiations reveal convergence on some issues and divergence on others. Proposals with a “high level of support” have been reflected in a document (WTO 2003); those that could not gather momentum have, at least for the time being, been kept aside (although they are technically still on the negotiating table, since it is up to the country proposing them to introduce them at some stage).¹

This chapter focuses on one proposal, the Mexican proposal to allow World Trade Organization (WTO) members to trade their rights for retaliation. This proposal—the most ambitious and innovative proposal ever submitted in this context—is meritorious and deserves to be discussed in a comprehensive manner.

To date, proposals made to the WTO are based largely on a “learning by doing” approach. A critical mass of cases has been adjudicated in the WTO, and some patterns regarding the various phases of adjudication (from request for bilateral consultations to enforcement) have emerged. The negotiations have been revealing. Instead of doing the usual beat-around-the-bush General Agreement on Tariffs and Trade (GATT) dance, some delegations have tabled daring proposals,

opting for radical reforms of the DSU rather than cosmetic changes that might incrementally, if at all, change the face of the system. The European Community (EC), for example, proposed moving to a permanent panelists regime, something like a first-instance court at the WTO. Many developing countries opted for renegotiation of the remedies regime in the WTO. The fact that a group of African states requested the introduction of monetary damages in the WTO legal system is evidence of the fact that the existing institutional possibility for countermeasures in cases of noncompliance is not a big hit with developing countries.

Section 13.1 of this chapter examines the empirical basis on which proposals requesting reform of enforcement procedures are based. The central question addressed is whether nonimplementation depends on the identity of the complainant and the defendant. As will become apparent from the data we discuss, implementation is much more likely when the complainant is a developed country and the defendant a developing country than vice versa. We establish that there is indeed a problem in the functioning of the DSU in this respect and that developing countries' proposals are addressing a real issue. We do not expect that through the negotiation of an international contract (such as the WTO) all imbalances and asymmetries between players will be wiped out. But we do expect that players will realize that it is essential from an institutional perspective to strike a compromise that will not make the same subgroup of players consistently unhappy.

In section 13.2 we discuss the idea that auctioning the right to retaliate could have beneficial effects and boost the rate of implementation of WTO decisions. It is in this context that we refer to the Mexican proposal, which is, for all practical purposes, based on the same reasoning. It is true that Mexico did not specifically refer to auction theory when submitting its proposal. In fact, Mexico did not even use the term *auctioning*, preferring to use the term *tradable rights* without any further detailed discussion. Section 13.2, which draws heavily on Bagwell, Mavroidis, and Staiger (2003), examines the extent to which auction theory can lend useful support to the Mexican proposal.

13.1 Implementation of WTO Obligations

The DSU makes it clear that WTO members cannot unilaterally define inconsistencies with the WTO contract. Such definitions are the exclusive privilege of the WTO adjudicating bodies. A WTO member that believes that practices by another member violate the WTO contract can request bilateral consultations, which, if not fruitful, could lead to a procedure before a WTO panel. All panel findings can be appealed. At the end of the adjudicating process, WTO members are granted an implementation period (in WTO parlance, a "reasonable period of time") if

immediate compliance is not possible. If there is disagreement as to the sufficiency of corrective actions taken during this period, a so-called compliance panel—and, eventually, an Appellate Body ruling—is requested to pronounce on the issue. If a panel (or Appellate Body) decision is not implemented during the appropriate implementation period, a WTO member has the right to request countermeasures, which it can impose until implementation has occurred. Countermeasures are thus the *ultima ratio* in the WTO enforcement process. Mutually agreed-on solutions can occur at any stage during the proceedings, but they must be consistent with the WTO contract and be notified to the WTO Dispute Settlement Body.

13.1.1 The Data

In order to assess whether a remedies reform is appropriate, we need to first establish the record for compliance in the WTO. To do so, we checked all disputes brought to the WTO since its inception in 1995. We adopt the definition of dispute adopted in Horn, Mavroidis, and Nordström (1999), that is, in case of multiple complaints we distinguish pairs of complainants and defendants and count them as separate disputes. A case therefore may be counted more than once if more than one WTO member complained about the practices of another WTO member. Where a request to join in consultations had not been accepted at the time of writing, the dispute was counted as a single dispute.

We consider all bilateral disputes in the WTO dispute settlement system between January 1, 1995, and June 30, 2003 (WTO dispute settlement numbers DS1–DS295).² We take the WTO membership as of July 1, 2003 (146 members), as the basis for analysis. We treat the EC as one unit, with complaints against individual EC members treated as directed against the European Community.

We distinguish between WTO members that are and that are not Organization for Economic Co-operation and Development (OECD) members. This distinction is not unproblematic. Although in principle the definition is meant to distinguish between developed and developing countries, it suffers from at least two weaknesses. First, some OECD members are poorer than other countries that are not OECD members (such as Mexico and Turkey). Second, such a classification by implication puts all developing countries in one basket, when in fact it is inappropriate to equate large, middle-income countries such as Brazil with poor, resource-scarce countries in Sub-Saharan Africa.³ These problems notwithstanding, the classification reflects to some extent the distinction between developed and developing countries. In an effort to correct for some of the more obvious anomalies, we count WTO members that joined the European Union in 2004 but that are not members of the OECD (that is, Cyprus, Estonia, Latvia, Lithuania, Malta, and Slovenia) as OECD members, even though formally they are not.

The data are divided into six categories:

- *Abandoned disputes.* We treat as abandoned all disputes in which the complainant has withdrawn the complaint or the authority of the panel has lapsed under Article 12.12 DSU. Legally, there is no dispute that such cases should be treated as abandoned. We have added two categories of cases under this heading: cases in which more than two years have passed since the panel was established and its composition has yet to see the light of the day and cases in which the WTO adjudicating body has exonerated the defendant from any legal responsibility. (We regard as irrelevant whether exoneration occurs at the panel stage and no appeal has been submitted or at the appellate level.)
- *Ongoing disputes.* Ongoing disputes are subdivided into the following categories: pending consultations, pending the panel's outcome, pending the Appellate Body's outcome, pending the Article 21.5 DSU panel's outcome, pending the appeal against a report by an Article 21.5 DSU panel, and other cases.
- *Disputes with uncertainty as to the outcome.*
- *Disputes settled before the end of the process (consultations and panel or Appellate Body proceedings).* These disputes are subdivided into two categories: cases of unilateral withdrawal of the contested measure and cases in which mutually agreed-on solutions were concluded before the end of the process.
- *Disputes in which reports by a panel or Appellate Body were implemented.* These disputes are subdivided into cases of unilateral implementation and cases into which a mutually agreed-on solution was concluded following a multilateral finding of inconsistency.
- *Cases that led to countermeasures (suspension of concessions).*

This chapter focuses on the last category of cases, as our interest is in the effectiveness of countermeasures to induce compliance.⁴ WTO (2003) describes the official record of the state of disputes.⁵ We adjusted some of the data reproduced in this document, as explained below, and corrected some of the information by looking at the official record before the WTO Dispute Settlement Body.⁶ Our classification of the data is to some extent explained by the exogenous "legal constraint" imposed by the WTO Dispute Settlement Understanding.⁷

13.1.2 Selection of Cases

The outcome of many WTO disputes is uncertain, for a variety of reasons. In some cases, we do not know if implementation actually occurred or not. In such cases, one could speculate that implementation is unlikely to have occurred, since if the WTO member had implemented its obligations in good faith it would have

little incentive not to notify the actual implementation. It may be that the parties failed to notify their mutually agreed-on solution or that the defendant failed to implement and no action by the complainant was taken against such failure. These cases are, of course, relevant were one to measure the effectiveness of WTO remedies. It could, for example, be that the complainant fears that “pushing” the defendant could be counterproductive. It could also be that the complainant believes its countermeasures will not induce compliance. We prefer to discard these cases, because of the high level of speculation involved as to what might have happened.

Disputes in which either the defendant withdrew the contested measure before the completion of the process or a mutually agreed-on solution was reached between the defendant and the complainant during the same time period are also discarded. We discard as well all disputes in which the contested measure was unilaterally withdrawn after completion of the issuance of the panel or Appellate Body report or a mutually agreed-on solution between the interested parties was reached.

We are then left with the data that are relevant for our analysis. In what follows, we deal with cases in which we know that implementation did not occur and that the complainant had the option to request and impose countermeasures. Provided that countermeasures are equivalent to the trade damage suffered, a simple request to this effect suffices for the interested party to be authorized the right to impose countermeasures. Countermeasures in WTO law are a means to induce implementation of obligations; they should not be understood as a perfect substitute for implementation. Hence almost by definition, countermeasures must be withdrawn once implementation has occurred.

We distinguish four scenarios: cases in which countermeasures are still in place (that is, cases in which countermeasures have not led to implementation); cases in which countermeasures have been withdrawn as a result of subsequent implementation; cases in which countermeasures have been authorized but not applied; and cases in which, faced with nonimplementation, the complainant did not request authorization to impose countermeasures (table 13.1).

13.1.3 What Do the Data Suggest?

The analysis of the cases is revealing. First, there is no occasion on which a developing country (non-OECD member) imposed countermeasures to induce compliance, even when faced with nonimplementation.⁸ Second, when faced with noncompliance, with only two exceptions (Brazil and Ecuador), non-OECD members did not even enter into the process of calculating damage, the first step toward requesting authorization to impose countermeasures. Third, when facing a recalcitrant

TABLE 13.1 Classification of Disputes before the WTO

Item	Countermeasures in place	Countermeasures that led to implementation
Complainant: OECD Defendant: OECD	<p>DS26: On July 26, 1999, the United States was authorized and imposed countermeasures against the EC for its failure to bring into conformity its legislation on hormones.</p> <p>DS48: As of July 26, 1999, Canada was authorized to impose and imposed countermeasures against the EC for its failure to bring into conformity its "hormones" legislation.</p> <p>DS108: On May 7, 2003, the EC was authorized to impose countermeasures of about \$4 billion against the United States; it has exercised these partially.</p>	<p>DS27: On April 19, 1999, the United States was authorized to impose and imposed countermeasures against the EC for its failure to implement the report of the panel and Appellate Body on bananas. Soon thereafter the United States imposed countermeasures that remained in place until 2003, when they were lifted, partially as a result of a mutually agreed-on solution (see WTO Docs. WTDS58 and 59) and partially as a result of the waiver accorded to the EC at the 2001 Doha meeting.</p>
Complainant: OECD Defendant: Non-OECD	None.	None.
Complainant: Non-OECD Defendant: Non-OECD	None.	None.
Complainant: Non-OECD Defendant: OECD	None.	None.

TABLE 13.1 (Continued)

Countermeasures authorized, no action taken	No request for countermeasures when faced with nonimplementation
DS46: The arbitrator established the level of countermeasures that Canada could impose against Brazil for Brazil's failure to implement the aircraft subsidies report (DS46ARB, August 28, 2000). Canada subsequently obtained authorization to impose countermeasures but never exercised the option.	DS27: Mexico did not request authorization to impose countermeasures against the EC for its failure to implement the report of the panel and Appellate Body on bananas.
None.	None.
DS27: On May 18, 2000, Ecuador was authorized to impose countermeasures against the EC for the EC's failure to implement the panel and Appellate Body report on bananas. Ecuador has never exercised this option. DS222: The arbitrator established the level of countermeasures that Brazil could impose against Canada for Canada's failure to implement the aircraft subsidies report (DS222ARB, February 17, 2003). Brazil subsequently obtained authorization to impose countermeasures but never exercised the option. DS70: This case has been overtaken by DS222.	DS27: Guatemala did not request authorization to impose countermeasures against the EC for the EC's failure to implement the panel and Appellate Body report on bananas. DS27: Honduras did not request authorization to impose countermeasures against the EC for the EC's failure to implement the panel and Appellate Body report on bananas.

Source: Authors' classification based on WTO documents.

opponent that represented a larger market, even OECD members have sometimes refrained from requesting the authorization to impose countermeasures (as Mexico did against the European Community in the bananas case). Fourth, when OECD members face nonimplementation, they imposed countermeasures.

It is difficult to pronounce on the effectiveness of countermeasures, but it is certainly true that OECD members (namely, Canada, EC, and the United States) have used them. The two cases in which OECD members did not impose countermeasures are odd. Canada did not impose countermeasures against Brazil in the dispute over export subsidies in regional aircraft, probably because Brazil could do the same (Bombardier, the Canadian producer, and Embraer, the Brazilian producer together hold dominant positions in the world market). The European Community initially did not impose countermeasures against the United States in the foreign sales corporation dispute, probably in light of the possible repercussions of blocking trade worth about \$4 billion a year. However, in 2005 the EC initiated partial countermeasures in the \$100–200 million range.

Our data reveal that there is no case with uncertainty as to its outcome in which an OECD member is the complainant and a non-OECD member the defendant. In contrast, there are six cases in which an OECD member is the defendant and a non-OECD member the complainant in which there was no request by the complainant to impose countermeasures. Thus the data suggest that countermeasures are a largely ineffective instrument in the hands of smaller players. Mexico's proposal is therefore aimed at a real problem.

13.2 Theory

In what follows, we analyze the economics of making the imposition of countermeasures (retaliation) a tradable right, an idea proposed by Mexico (WTO 2002).

13.2.1 Potential Benefits of Auctioning Countermeasures in the WTO

In proposing that WTO countermeasures be made tradable, Mexico suggested that doing so might help small countries, especially developing countries, solve a practical problem with effective retaliation that they otherwise might face. According to the proposal:

The suspension of concessions phase poses a practical problem for the Member seeking to apply such suspension. That Member may not be able to find a trade sector or agreement in respect of which the suspension of concessions would bring about compliance without affecting its own interests. There may be other Members, however, with the capacity to effectively suspend concessions to the infringing member. (WTO 2002, 5)

The proposal identifies two potential benefits from making tradable the right to impose countermeasures within the WTO. The first is that “facing a more realistic possibility of being the subject of suspended concessions, the infringing Member will be more inclined to bring its measure into conformity.” The second is that the plan would lead to “better readjustment of concessions, since the affected Member would be able to obtain a tangible benefit in exchange for its right to suspend” (WTO 2002, 6).

Our data, while not conclusive, suggest that small and developing countries may indeed face practical problems once they reach the suspension of concessions phase of a WTO dispute, as the Mexican proposal indicates. In this section we discuss the likelihood that permitting WTO countermeasures to be tradable might yield the benefits suggested in the Mexican proposal.⁹

The theoretical results of Bagwell, Mavroidis, and Staiger (2003) lend support to Mexico’s suggestion that auctioning countermeasures in the WTO can lead to both better incentives for compliance and better readjustment of concessions, if we gauge the incentive for compliance on the basis of the cost inflicted on the infringing government (more is better) and gauge the readjustment of concessions on the basis of the expected revenue generated by the government running the auction (more is better). Our theoretical results also indicate a third potential benefit: by auctioning countermeasures in the WTO, the existing right of retaliation may be more efficiently allocated to the WTO member who values this right most highly.

The possibility of externalities across bidders in the auction arises naturally in this setting, and these externalities can disrupt auction performance with regard to each of the three benefit dimensions listed above. The precise pattern of externalities depends on a key feature of auction design, namely, whether the infringing government is permitted to bid to “retire” the right of retaliation. After describing these externalities, and the way in which they depend on the design of the auction, we describe how different auction designs can imply different auction performance along each of the three benefit dimensions. We argue that the appropriate choice of auction design is likely to depend on which of these three dimensions is the most important goal of permitting countermeasures to be auctioned in the WTO.

13.2.2 Externalities across Bidders

We begin by describing the nature of the externalities across bidders that are likely to arise in an auction of WTO countermeasures. First, we must define what we mean by an externality in this setting. An auction exhibits positive externalities across bidders if one bidder would rather lose to another bidder than have no

bidder win the object. We say that an auction exhibits negative externalities across bidders if one bidder would rather have no bidder win the object than to lose to another bidder.

In a standard auction setting, every bidder is typically assumed to be indifferent to losing to some other bidder and having no bidder win the object (that is, in traditional auction analysis, the absence of externalities across bidders is typically assumed).¹⁰ To see why this standard assumption is not likely to be met in the case of auctioning of WTO countermeasures, suppose that Honduras has been granted the authority to impose countermeasures against the European Community, that Honduras does not have the capacity to use this right, and that it puts this right (say, the suspension of concessions against the European Community of \$100 million) up for auction. Suppose further that Canada and the United States choose to take part in the auction and bid for this right of retaliation against the European Community, that there are no other bidders, and that each country will choose largely the same list of imported EC products upon which to retaliate if it wins the right by placing the winning bid in the auction. To keep things simple, suppose that there is a single retaliation good, feta cheese: if either Canada or the United States obtains the right from Honduras to suspend concessions against the European Community, it will use this right to block \$100 million of EC feta cheese imports from its markets.

Under these circumstances, an externality between Canada and the United States will naturally arise in the auction of WTO countermeasures. That is, it is highly unlikely that Canada will be indifferent to losing to a higher bid from the United States and having no bidder win the right to retaliate against the European Community. This is because, relative to the status quo that obtains if Canada loses and no bidder wins the right to retaliate against the European Community, there will be an impact on Canada if it loses and the United States wins the right to retaliate, since at least a portion of the \$100 million of EC feta cheese exports that would have gone to the U.S. market will now be diverted into the Canadian market. Whether the trade diverted into the Canadian market in this circumstance is perceived by the Canadian government as a good thing relative to the status quo (in which case there is a positive externality across bidders) or a bad thing relative to the status quo (in which case there is a negative externality) will depend on the circumstances faced by the Canadian government. The essential point is that an externality naturally arises between bidders in an auction of WTO countermeasures.

Let us next consider whether the externality between Canada and the United States is likely to be positive or negative. There will be two impacts on the Canadian economy when EC feta cheese originally destined for the U.S. market is diverted into the Canadian market. First, the price charged by EC feta cheese

exporters can be expected to fall somewhat, improving the terms of trade for Canada and leading to a consequent rise in Canada's real national income. This impact suggests a positive externality between bidders. But there is also a second impact. The fall in the price of feta cheese in Canada occurs as a result of the fixed Canadian feta cheese tariff and the falling "world" (that is, EC exporter) feta cheese price. If the Canadian government is not too concerned about the employment and income distribution consequences of this drop in the internal Canadian price of feta cheese, the first impact will dominate and there will be a positive externality across bidders. If, however, political pressure from Canadian feta cheese producers is sufficiently intense, the second impact could be negative and weigh sufficiently heavily in the preferences of the Canadian government to overturn the terms of trade considerations. In this case, a negative externality between bidders would arise. We adopt the view that the "normal" case is the one in which political pressures are not intense and positive externalities between bidders arise.¹¹

Our focus on the case of positive externalities between bidders does not rule out the possibility that Canada and the United States each face very significant political pressures to protect their feta cheese industries from imports. In fact, in Bagwell, Mavroidis, and Staiger (2003), we assume that this political pressure is privately observed by each government but that it can range from no significant political pressure to a high degree of political pressure that would make the government an aggressive bidder to win the right to unilaterally block feta cheese imports from the European Community. That is, the assumption that a government faces an upper bound on its political pressure so that it always prefers to lose to the other bidder rather than maintain the status quo (nobody wins) does not rule out the possibility that the political pressure faced by the government is nevertheless sufficiently intense that it would prefer (gross of its bid) to win the auction rather than to lose to the other bidder. This assumption serves only to guarantee that the externality between bidders is positive over the entire range of their possible political pressure realizations.

At the same time, it is instructive to point out that, under sufficiently weak political pressure to protect its feta cheese industry, a government would prefer (gross of its bid) to lose the auction to the other bidder rather than win the auction itself. This is because in either case it enjoys the terms of trade benefits (a lower EC exporter price) of the retaliation against EC exports of feta cheese, while if it loses it can avoid the distortionary costs associated with the higher-than-world prices for feta cheese that would prevail locally as a result of the tariff if it won (this scenario assumes that the government does not value higher prices very highly for political reasons). We return to this observation in the next subsection.

We have identified an externality between bidders who are competing importers of the retaliation good and suggested that this externality will be positive in the typical case faced in an auction of WTO countermeasures. Suppose, though, that the infringing country (the European Community, in our example) were also allowed to bid. If it won the bid, the right of retaliation would be retired (that is, it would not be used). If the European Community is permitted to bid to retire the right of retaliation against it, the pattern of (positive) externalities across bidders that was identified above would become more complicated. On the one hand, both Canada and the United States would be indifferent to the status quo (nobody wins) and losing to the European Community (the right of retaliation is retired), so the presence of the European Community as a bidder at the auction imposes no externality on Canada or the United States. On the other hand, the European Community would ordinarily prefer the status quo (nobody wins) over losing to either Canada or the United States and facing retaliation, so Canada and the United States each impose a negative externality on the European Community when it is also bidding.

These observations suggest that the pattern of externalities across bidders in an auction of WTO countermeasures depends on whether the infringing country is permitted to bid to retire the retaliation right against it. In a basic auction, in which the infringing country is not permitted to bid, there will normally be positive externalities across bidders. In an extended auction, in which the infringing country is also permitted to bid, there will normally be both positive and negative externalities across (different) bidders.

13.2.3 The Basic Auction (Infringing Government Not Permitted to Bid)

An important feature of the basic auction that arises as a result of the positive externalities across bidders is the possibility of auction failure (Bagwell, Mavroidis, and Staiger 2003). In the context of the example above, auction failure refers to a situation in which Honduras holds an auction of its right of retaliation against the European Community and receives no bids from either Canada or the United States, even though Canada and the United States each value acquiring this right (that is, each would prefer winning to the status quo that would prevail if nobody wins). Auction failure can occur in the basic auction even when the reservation price—the lowest (nonnegative) bid permitted by the auction—is set at zero. In this case, as a result of the positive externality between bidders, Honduras would find that it cannot even give away its right of retaliation against the European Community.

The basic intuition for the possibility of auction failure in this setting follows fairly directly from our description of the positive externalities between bidders in

the basic auction. If Canada, for example, faces a low (and privately observed) level of political pressure to protect its feta cheese industry, it will prefer (gross of its bid) to lose the auction to the United States rather than win. Canada prefers to win over the alternative that nobody wins. (Notice that these two statements can hold simultaneously only because there is a positive externality, so that Canada prefers to lose rather than see nobody win.) If Canada is sufficiently certain that the United States will bid—perhaps because it believes that the United States is likely to be facing a degree of (privately observed) political pressure that makes the United States prefer to win rather than lose—it will not bid in the auction (thereby hoping to “lose” to the United States). If the United States also faces a low (and privately observed) level of political pressure to protect its feta cheese industry and it is sufficiently certain that Canada will bid, it will not bid in the auction either (hoping to “lose” to Canada). The basic auction will fail to generate bids if the degree of political pressure for import protection in the economies of the potential bidders is sufficiently low (see Bagwell, Mavroidis, and Staiger [2003] for the formal proof).

When the degree of political pressure is sufficiently low across potential bidders so that auction failure occurs, the basic auction will fail to deliver on the first two benefits noted above. It fails to provide any incentive for compliance, since the infringing government faces no new costs as a result of the basic auction. It fails to provide any readjustment of concessions, since the government running the auction fails to generate any revenue. As for the third dimension of allocative efficiency, whether or not the basic auction delivers in this case depends on how costly retaliation is to the infringing government. If retaliation is sufficiently costly to the infringing government, it is better from an efficiency standpoint that no retaliation occur, so allocative efficiency is served by failure of the basic auction. If retaliation is not very costly to the infringing government, allocative efficiency requires that the right of retaliation be allocated to the (competing-importer) government that most values its use. In this case, the basic auction fails to achieve allocative efficiency.

If the degree of political pressure for import protection is sufficiently intense, a government will prefer (gross of its bid) to win rather than lose. In this case the outcome of the auction looks like a more standard auction, with the (competing-importer) country that most highly values the right of retaliation making the winning bid and with bids reflecting individual valuations. When the political pressure faced by at least one potential bidder is sufficiently intense, we can expect the basic auction to perform well in terms of inflicting the cost of retaliation on the infringing government and generating revenue for the government running the auction commensurate with the maximum amount consistent with the valuations of the potential bidders. Whether or not the basic auction improves

allocative efficiency depends on how costly retaliation is to the infringing government. If retaliation is sufficiently costly to the infringing government, it is better from an efficiency standpoint that no retaliation occur. In this case the basic auction fails to achieve allocative efficiency. If retaliation is not very costly to the infringing government, allocative efficiency requires that the right of retaliation be allocated to the (competing-importer) government that most values its use. In this case the basic auction achieves allocative efficiency.

Given the bidding behavior described when political pressure is sufficiently low or sufficiently high, Bagwell, Mavroidis, and Staiger (2003) show that over an intermediate range of realizations for political pressure, all bids must be made at the auction's reservation price and a random sharing rule is used to break ties and allocate the retaliation right. Over this intermediate range of realizations of political pressure, bids do not rise with rising valuation, and the resulting allocation across countries is also independent of valuation. As a result, when the political pressure faced by each potential bidder falls in this intermediate range, we can expect the basic auction to perform in a "mediocre" fashion: it inflicts the cost of retaliation on the infringing government, but it does not generate revenue for the government running the auction commensurate with the maximum amount consistent with the valuations of the potential bidders or (except by chance) allocate the right of retaliation efficiently to the government that values it most.

Over the range of possible realizations of political economy pressure, then, the basic auction of WTO countermeasures can be expected to deliver something on each of the three benefits of such an auction. Positive externalities between bidders, however, will tend to reduce the benefits relative to what they would have been in the absence of such externalities.

13.2.4 The Extended Auction (Infringing Government Permitted to Bid)

As we establish in Bagwell, Mavroidis, and Staiger (2003), the outcome of the extended auction in which the infringing government is also permitted to bid differs strikingly from the outcome of the basic auction. At least when the auction's reservation price is set sufficiently low, there is no possibility of auction failure in the extended auction. That is, permitting the infringing government to bid to retire the right of retaliation against it will ensure that the auction of WTO countermeasures does not fail.

In fact, in the low reservation price case, we can say more: in the extended auction, the infringing government always places the highest bid and retires the right of retaliation against it. Intuitively, this is because the positive externalities across the other (competing-importer) bidders keep either of them from bidding

sufficiently high to beat what the infringing (exporting) government—which faces all the costs of the retaliation—is willing to pay to avoid the retaliatory tariff. Hence if the European Community is permitted to bid to retire the right of retaliation against its feta cheese exporters in the auction run by Honduras, it will place a bid that beats the highest possible bid that either Canada or the United States could make, and the right of retaliation will be retired.¹²

How does the extended auction perform with respect to the three dimensions of benefits described above? Consider first the incentives for compliance. Interestingly, while we have just observed that there will be no retaliation against the infringing government when it is permitted to bid to retire the right of retaliation against it, it is nevertheless the case that incentives for compliance will be created by the extended auction: they simply take the form of cash payments made by the infringing government to the auctioneer. Hence with regard to incentives for compliance, relative to no auction, the extended auction increases the cost of noncompliance faced by an infringing government and changes the form of payment normally associated with WTO compensation” from retaliatory tariffs to cash. In effect, then, the extended auction provides a way to induce infringing governments to pay cash compensation to successful claimants in a WTO dispute.

Consider next the readjustment of concessions. The flip side of the compliance effect of this cash payment is the readjustment of concessions for the government running the auction. Relative to no auction, the extended auction leads to better readjustment of concessions.

Finally, consider the efficient allocation of retaliation. Given that the infringing government always wins the extended auction and retires the right of retaliation against it, allocative efficiency is attained in the extended auction if and only if retaliation is sufficiently costly to the infringing government, so that it is better from an efficiency standpoint that no retaliation occur.

13.2.5 Auction Design: Should the Infringing Government Be Permitted to Bid?

We now compare the performance of the basic and extended auctions along the three benefit dimensions, in order to assess whether the infringing government should be permitted to bid to retire the right of retaliation in an auction of WTO countermeasures. We describe how the two auctions can perform differently along each of these dimensions and argue that the preferred auction design is therefore likely to depend on which of these three dimensions represents the most important goal of permitting countermeasures to be auctioned in the WTO.¹³

Consider first the incentive for compliance. At one level, it might be thought that the infringing government will face the highest costs when it is prevented from bidding in the auction (that is, under the basic auction). After all, it might seem that a “revealed preference” argument would indicate that the infringing government must face lower costs when it is permitted to bid (that is, under the extended auction), because it chooses in this case to make a sufficiently high bid to guarantee that it will not face retaliation. This reasoning is incorrect: the presence of the infringing government at the extended auction alters the bidding behavior of the other governments in a way that can be so unfavorable to the infringing government that it would do better if it had been barred from the auction. In terms of our example, Canada and the United States would be induced to bid far more aggressively if they knew that the European Community was also bidding (and that it would retire the right of retaliation if it won). This means that the European Community must in turn bid aggressively to beat the Canadian and U.S. bids. In the basic auction, in contrast, there is always the chance that the European Community will “get lucky” and the basic auction will end in failure (with no retaliation against the European Community).

As this discussion suggests, whether or not the European Community would prefer the expected outcome of the basic auction or the extended auction depends on how likely auction failure is in the basic auction: if auction failure is sufficiently likely in the basic auction, the European Community fares better under it than under the extended auction, and the incentive for compliance is served best under the extended auction. If auction failure is not likely, compliance is best served under the basic auction. Hence with regard to compliance, the choice between auctions depends on the likelihood of auction failure in the basic auction: the more likely auction failure is in the basic auction, the better the extended auction is from the point of view of providing incentives for compliance.

Consider next the readjustment of concessions. Here the choice between auctions is unambiguous: the extended auction always yields more revenue for the auctioneer than the basic auction. In the context of the example, Canada and the United States will be induced to bid far more aggressively if they know that the European Community is also bidding (and that it will retire the right of retaliation if it wins). This means that the European Community must bid aggressively to win the extended auction; to do so, it must bid more than what could conceivably have been the winning bid in the basic auction.

Finally, consider the efficient allocation of the right of retaliation. The extended auction always retires the right of retaliation and so always ends with no retaliation. The basic auction yields no retaliation under auction failure, allocates retaliation randomly across bidders when their political pressure is in an intermediate range, and allocates the right of retaliation to the highest-value bidder when

its political pressure is sufficiently strong. Clearly, then, if retaliation is sufficiently costly to the infringing government, so that it is better from an (*ex ante*) efficiency standpoint if no retaliation occurs, the efficient allocation of the right of retaliation is best served by the extended auction. If, however, retaliation is not so costly to the infringing government, allocative efficiency requires that the right of retaliation be allocated to the (competing-importer) government that most values its use. In this case, the basic auction may outperform the extended auction on this dimension.

This analysis suggests that the preferred auction design is likely to depend on which of the three dimensions of benefits of an auction is most important. If the readjustment of concessions is paramount, the infringing government should be permitted to bid to retire the right of retaliation. If the incentive for compliance is foremost, the infringing government should be prevented from bidding in the auction, unless the likelihood of auction failure is sufficiently great. If the efficient allocation across governments of the right to retaliate is dominant, the infringing government should be prevented from bidding in the auction, unless the political costs it faces in the event of retaliation are sufficiently great.

13.3 Concluding Remarks

Tradable retaliation rights have been formally proposed by Mexico as a potential solution to a perceived practical problem. The attractiveness of Mexico's proposal is that it offers an additional option to injured WTO members to get something from the dispute settlement mechanism without putting into question the legal nature of the existing contract, that is, the predominantly decentralized system of enforcement in the WTO. Our data, while not conclusive, lend some support to Mexico's perception that small countries, especially developing countries, face a practical problem when they attempt to carry through with effective retaliation within the WTO system. Formal economic theory suggests that Mexico's proposed solution has merit.

At this stage, we deem it precarious to set out the formal amendments to the DSU needed to accommodate Mexico's proposal. Indeed, Mexico did not offer a concrete proposal beyond the idea of tradable rights. In this spirit, we have limited our observations to a discussion of the substantive merits of Mexico's proposal and have refrained from proposing any concrete redesign of the DSU.

We would argue that auctioning countermeasures in the WTO is an idea that should be studied seriously. This is not to say that introducing such auctions is necessarily a good idea. It may be a very bad idea. This possibility is especially apparent when one considers the likely political ramifications that would arise when one government, as a result of placing the winning bid in an auction,

imposed WTO-sanctioned retaliatory tariffs against a second government with whom it had no unresolved WTO dispute. Needless to say, the political costs and public perceptions associated with such an action could be far more costly to the workings of the WTO than any benefits that we have assessed. Similar statements, however, could be made about any attempt to bring multilateral elements into WTO dispute resolutions for the purpose of helping small and developing countries take part more effectively in the WTO system. In this light, the auctioning of countermeasures in the WTO deserves serious study, because it represents one (in principle, particularly effective) way to multilateralize the WTO dispute procedures for this purpose.

Notes

1. That is, there is no legal obligation to concentrate, during the remaining stages of multilateral negotiations, only on those proposals considered to have a high level of support.

2. A description of each case can be found on the WTO Web site (<http://www.wto.org>).

3. For a more elaborate subdivision among WTO members in a dispute settlement context, see Horn and Mavroidis (2003).

4. For a list of all cases falling into categories 1–5, see Bagwell, Mavroidis, and Staiger (2004).

5. Information about the outcome of disputes can also be found in other sources. Horn, Mavroidis, and Nordström (1999) point to what they call a “third circle” of disputes that have never been notified to the WTO but concern cases in which a change in trade policy has been requested through unofficial channels.

6. In some cases the information provided to the Dispute Settlement Body was included in the Overview series. We privilege the former, since it reflects the official stance of the WTO member concerned, whereas the Overview document is simply information compiled by the WTO Secretariat.

7. These include a number of very old disputes, because there is no maximum limit in the Dispute Settlement Understanding restricting the duration of bilateral consultations. The right to a panel can be exercised following the passage of statutory deadlines (see, for example, Articles 4.3 and 4.7 of the Dispute Settlement Understanding), but there is no legal obligation to submit a dispute to a panel. Parties can consult forever. Conversely, the panel’s authority lapses 12 months after its work has been suspended.

8. Although the European Community announced its intention to request authorization to adopt countermeasures against the United States as a result of the United States’ unwillingness to implement the Appellate Body’s rulings in the foreign sales corporation (FSC) dispute, as of mid-2005 the European Community had not taken action.

9. The presentation here is informal and intuitive rather than technical. The technical conditions under which the discussion can be formalized into precise statements are given in Bagwell, Mavroidis, and Staiger (2003).

10. Recently, the auction literature has begun to consider systematically the analysis of auctions with externalities. For important contributions to this literature, see Das (2002); Ettinger (2002); Haile (2000); and Jehiel and Moldovanu (1996, 2000, 2001).

11. The negative externality case is not unreasonable—it would be consistent, for example, with an importing government wishing to negotiate voluntary export restraints with exporting governments—and warrants investigation.

12. A number of more intricate technical issues arise in constructing the equilibriums of the extended auction (see Bagwell, Mavroidis, and Staiger [2003] for details).

13. Many other features of auction design, such as the setting of the reservation price or the nature of the bidding (sealed or open, ascending or descending, first price or second price), can also have important implications in this auctions-with-externalities setting. We follow Bagwell, Mavroidis, and Staiger (2003) and emphasize whether or not the infringing government should be permitted to bid as a novel and key feature of the design of auctions for WTO countermeasures.

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PART IV

ISSUE LINKAGES

DO WE NEED AN UNDERTAKER FOR THE SINGLE UNDERTAKING? CONSIDERING THE ANGLES OF VARIABLE GEOMETRY

Philip I. Levy

Perhaps the most striking accomplishment of the Uruguay Round was the extent to which the vast bulk of the world's trading nations agreed on the vast bulk of rules governing world trade. Whereas the Tokyo Round had featured important agreements signed by only a limited group of participants, the Single Undertaking obliged signatories to the final act to accept or reject the whole agreement.¹

This approach helped address a long-standing problem inherent in the General Agreement on Tariffs and Trade (GATT) principle of most-favored-nation (MFN) treatment: the ability of countries to “free ride” on the liberalization of others. If two participants sign an agreement to reform their antidumping procedures, for example, the benefits may be extended to a third, nonsignatory country without any reciprocal obligation.²

The Single Undertaking approach also allowed for trade-offs across issues that would otherwise seem unrelated. According to the standard mercantilist calculus, developed countries made concessions on textiles and apparel while developing countries made concessions on Trade-Related Aspects of Intellectual Property Rights (TRIPS).³ Liberalization in agriculture was balanced against liberalization of trade in services. To argue that the agreements in each of these areas would have worked as stand-alone negotiations would require that all major participants saw themselves as gaining from all of the agreements—something that clearly was not the case. The linkages made possible by the Single Undertaking were central to the

gains in world welfare that have flowed and will continue to flow from the Uruguay Round.⁴

Despite this success, the idea of a large negotiating round came under attack almost as soon as the Uruguay Round ended. A built-in agenda stemmed from the round itself, which called for negotiations on information technology, telecommunications, financial services, shipping, and the movement of natural persons. By 1999 new negotiations on agriculture were to commence. All these negotiations were designed to be independent of one another (devoid of linkages). The apparent success of some of these negotiations (on information technology, telecommunications, and financial services) has emboldened critics of broader rounds.

The Clinton administration in the United States was the most vigorous advocate of a sector-by-sector alternative to rounds of negotiations. This stemmed in part from its belief that the Uruguay Round was too complex and time consuming.⁵ There was also a concern that delay imposed welfare costs by unnecessarily postponing viable liberalization. In his May 1998 address to ministers at the World Trade Organization (WTO), President Clinton said:

We should explore what new type of trade negotiating round is best suited to the new economy. We should explore whether there is a way to tear down barriers without waiting for every issue in every sector to be resolved before any issue in any sector is resolved. We should do this in a way that is fair and balanced, that takes into account the needs of nations large and small, rich and poor. But I am confident we can go about the task of negotiating trade agreements in a way that is faster and better than today. (WTO 1998)

This idea entered into trade parlance as an “early harvest”—reaping the benefits of each negotiating area as it ripens. Implicit in this notion is the belief that it is possible to reach liberalization agreements in some sectors without agreement in others. At a trivial level, this must be true, since liberalization agreements have been reached and some sectors remain untouched by GATT rounds. At a less trivial level, this raises several important questions. What is the appropriate scope of a negotiating round? Is it generally possible to reach agreements sector by sector? If it is possible, is it advisable?

The Doha Round of trade negotiations was launched in 2001, as a successor to the Uruguay Round. While areas of negotiation were identified, largely matching up with those of the Uruguay Round, the exact scope of the talks remains a matter of substantial controversy. The Cancun Ministerial Meeting of September 2003 failed in large part because of a dispute over whether or not negotiations should cover the Singapore issues of investment, competition, government procurement, and trade facilitation.

This chapter attempts to bring existing economic theory to bear on these questions. In the next section, I review the traditional case for package deals in trade

rounds, bolster that case with some theory, and then challenge it with the apparent success of sectoral negotiations. I argue that the track record of the sector-by-sector approach is less attractive than it seems and that its successes may well have had negative effects on future negotiations beyond the unfortunate procedural precedent.

Accepting the argument that broad rounds are desirable begs the important question of just how broad a round should be. In lieu of a precise answer to that question, section 14.2 tries to clarify the issues surrounding the scope of the round. These issues include the importance of limited negotiating resources in developing countries and the extent to which the agenda is linked to the eventual outcome. This section also considers whether there are “natural” demarcations by which one might include or exclude negotiating topics.

In section 14.3, I turn to the question of the Single Undertaking. While the Single Undertaking is closely related to issue linkage, it goes further to require that nothing is agreed to until everything is agreed to. The contrast need not be only with single-sector negotiations; there is also the possibility of plurilateral agreements among a subset of the negotiating countries. There are serious obstacles to repeating the feat of the Uruguay Round.

14.1 One Sector or Two?

This section lays out the conventional wisdom in support of linking negotiating issues in trade rounds. It then attempts to relate such views to theoretical economic models, in the hope that these models will help answer questions about the appropriate scope of linkage. The section then considers the post-Uruguay Round experience with single-sector negotiations. The section concludes with a summation of the case for linkage across sectors.

14.1.1 *Conventional Wisdom about Packaging*

Given the challenges to broad negotiating rounds, the extent to which distinguished analysts agree that such bundling has been vital to the success of postwar trade liberalization is remarkable. In *After Hegemony*, political scientist Robert Keohane notes that “clustering of issues under a regime facilitates side-payments among those issues: more potential *quids* are available for the *quo*. Without international regimes linking clusters of issues to one another, side-payments and linkages would be difficult to arrange in world politics” (1984, 91). Keohane cites the GATT as an example of an institution in which such linkage has worked well, allowing for trade-offs across sectors.

Preeg (1995) discusses packaging in the Uruguay Round. He notes that while such packaging had been a persistent feature of GATT negotiations, the scale to

which it was attempted in the last round was much greater than in the previous round. He concludes:

This unprecedentedly comprehensive round strategy did, in the end, work, despite many misgivings throughout the negotiations that it was too ambitious and complicated. There was a weakening of the draft agreement for some issues, particularly in the final phase of negotiations, but this was to be expected. . . . In contrast, it is doubtful that such politically sensitive issues as agriculture, textiles and intellectual property rights, to name only a few, could have been negotiated with comparable result on an individual basis. (185)

Since these are sectors in which some of the round's most trumpeted achievements took place, this statement is tantamount to saying that packaging was central to the multilateral liberalization achievements of the past 20 years.

Looking forward, Krueger (1999) identifies the trend toward sector-by-sector negotiation as one of the key threats to the multilateral trading system. The principal problem is the same one identified above—the inability to deal across sectors in too narrowly focused negotiations. She asserts that a sector-by-sector process would likely bias future liberalization toward the interests of developed countries. As she notes, “The ability of developed countries to define the agenda and to support negotiations only for sectors in which they believe they have a comparative advantage (such as information technology) makes the likelihood that developed countries’ protection against imports from developing countries will be reduced considerably smaller” (Krueger 1999, 930).

Stiglitz (2000) espouses comprehensiveness as one of the two basic principles that should be pursued in any ensuing round (the other is fairness). He points to the important role of export interests in pushing for passage of the North American Free Trade Agreement in the United States. By addressing issues separately, sectoral negotiations separate import-competing and exporting lobbies.

The qualms politicians have voiced about broad rounds are not without support from analysts, however. Keohane, who generally supports linking issues, is skeptical of the kind of package that crosses issue boundaries:

Suppose, for instance, that each issue were handled separately from all others, by a different governmental bureau in each country. Since a side-payment or linkage always means that a government must give up something on one dimension to get something on another, there would always be a bureaucratic loser within each government. Bureaus that would lose from proposed side-payments, on issues that matter to them, would be unlikely to bear the costs of these linkages willingly on the basis of other agencies’ claims that the national interest required it. (1984, 91)

This is noteworthy, because the Uruguay Round expansion of the trading agenda into new issues, such as services, investment, and intellectual property, meant that new agencies would be brought into intragovernmental discussions.

Schott and Watal (2000) argue that the 1999 breakdown in talks in Seattle was attributable to the increased complexity of the task. They identify the increased membership of the WTO as a complicating factor, along with the Single Undertaking requirement that all countries be involved on all issues. They note that this requirement implies that developing countries need to commit to substantially greater trade policy reforms than they did in the past and therefore need to be better informed about issues under negotiation. This may impede the type of flexible agenda setting that was the norm in earlier multilateral trade negotiating rounds.⁶

14.1.2 The Theory behind the Conventional Wisdom

There is, then, widespread agreement that linkages are useful, but there are also concerns that costs may mount as negotiations become overly broad and involve multiple national stakeholders (ministries, regulators, government agencies). The challenge is to find a happy medium. In an effort to find it, I consider some of the theoretical foundations for the linkage arguments made above.

At the simplest level, one might suppose that all governments participating in a set of trade negotiations have preferences over domestic prices and that these prices are affected by trade policies. Many common trade instruments have the effect of helping the implementing country at the expense of trading partners. Frequently, the expense exceeds the benefits to the implementing country. Thus one might think of an agreement that all participants could sign that would raise the welfare of each of them. In fact, there are likely to be many such agreements that would be mutually beneficial. How the gains are divided in such a situation has been the central issue of bargaining theory.⁷ However the gains are split, the countries sign the resulting accord and the game is finished.

This level of abstraction does not address issues such as whether countries are maximizing the unweighted sum of citizens' welfare or favoring politically powerful domestic actors. Even without introducing these issues, there is a difficulty. The bargaining story above is most plausible in a national setting, in which the resulting agreement might be enforced by a judicial system. It is much less satisfactory in an international setting, where no such system exists.

The Uruguay Round establishment of the WTO significantly strengthened the GATT's dispute settlement mechanism. But that system does not mete out its own punishments. Rather, the punishment for reneging on an agreement is the reciprocal withdrawal of concessions by the aggrieved trading partner. Thus whatever agreement is reached must be "self-enforcing"—the terms must be such that no signatory to the agreement has an incentive to deviate from the accord. Thus one would expect that enforcement issues subsequent to an agreement have an important effect on the shape of the agreement.⁸

In the context of trade liberalization, Dixit (1987) introduces the idea of an infinitely repeated game between two countries. Each country would like to impose a relatively high tariff on the other, but they are mutually worse off if they do so. Cooperation in the form of lower tariffs can be supported by the threat of future imposition of the high tariffs (a trade war) in response to any provocation.

Bagwell and Staiger (1990) extended this approach with a description of the “most cooperative tariff” that two countries could sustain. For a given level of future trade volumes, the lowering of the cooperative tariff increases both the incentive to defect from the agreement (since the gap between cooperative tariff and optimal tariff is larger) and the incentive to cooperate (since the pain induced by a future trade war rises with the degree of cooperation). Bagwell and Staiger derive the lowest tariff at which the incentive to cooperate and the incentive to defect exactly offset each other.

For later purposes, it is worth introducing here the term “slack in the incentive constraint.” The incentive constraint is the restriction on the cooperative tariff level at which a country is better off maintaining the cooperative level than it would be by defecting and suffering the future consequences. At tariff levels above the lowest cooperative tariff, the benefits of cooperation more than offset the appeals of defection; thus there is “slack” in the incentive constraint.

Both Dixit (1987) and Bagwell and Staiger (1990) identify an important role for issue linkage. Since they are emphasizing other points, they describe a world with only two sectors. Yet it is the threat of retaliation in the export sector that induces a country to liberalize its import sector. It would be meaningless to think of a sector-by-sector approach here. In neither sector would the importing country have any incentive to alter its policy from the noncooperative level. Aside from bargaining considerations, in a two-sector model the sectors are necessarily linked by general equilibrium considerations.

This infinitely repeated game approach is put in a political economy framework by Levy (1999). In that model, government preferences are shaped, in part, by lobbies. In each of two countries, there are assumed to be two sectors that feature lobbying groups. The export lobby in one country thus is pitted against the import-competing lobby in the other. Governments are limited in their abilities to meet the lobbies’ requests. It is easy to help the import-competing industries—the government can impose protection directly. It is more difficult to help the export industries (though the governments may be even more anxious to do so). The exporters can be helped only through reciprocal liberalization. This effectively pits the export lobby in a country against the import-competing lobby of the same country. The model is constructed in such a way that general equilibrium considerations play no role. This is, then, a theoretical

basis for Stiglitz's concern that if the concerns of export interests are somehow addressed separately, no force will remain to push for lower protection in the import-competing sector.

Each of these theoretical works provides an illustration of why one would wish to link different sectors in a trade negotiation. Because of their focus on an illustrative pair of sectors, they provide little guidance on which sectors should be included in negotiations. To that end, I consider one last theoretical work on self-enforcing agreements, Bernheim and Whinston (1990) on "multimarket contact." They show that when players encounter each other across a range of sectors, the breadth of contact can only help, not hurt, the extent of cooperation they can achieve. Although Bernheim and Whinston nominally consider the behavior of firms that compete in a range of different markets, their conclusions are readily applicable to self-enforcing trade agreements.

Their argument is that a broad agreement allows players to "pool" their incentive constraints across sectors. For example, if a country defects from a trade agreement in one sector, it could be punished across the various sectors in which it encounters the trading partner. In deciding whether or not to defect, a country takes this enhanced threat of punishment into account.

It is not immediately obvious that such linkage will allow for greater liberalization. If a country were to defect despite the prospect of punishment across a broad range of sectors, it would then wish to defect across the entire range of sectors, rather than in a single one (the punishment would be no worse).

Bernheim and Whinston show that the extent of additional liberalization that might be achieved depends on slack in the countries' incentive constraints. If the incentive to cooperate exactly offsets the incentive to defect in each linked sector, the total incentive to cooperate across sectors should exactly offset the total incentive to defect and nothing additional could be achieved. Suppose, though, that there was a sector in which free trade could easily be supported by the threat of future reversion to noncooperative play ("easily" here means that the incentive to cooperate is strictly greater than the incentive to defect). Next imagine a second sector, in which the lowest supportable cooperative tariff is greater than zero. The "slack" in the first sector's incentive constraints can be put to use in the second sector to allow for a lowering of tariffs. The tariff can be lowered until the total incentive to cooperate just offsets the total incentive to defect. Thus the linkage of sectors allows for greater overall liberalization.

This implies that the sectors that one would most wish to include in a package deal are exactly those sectors that would be easiest to negotiate in stand-alone talks. I return to this point after a brief discussion of recent experience with single-sector negotiations.

14.1.3 Challenge to Conventional Wisdom: Single-Sector Agreements

In the wake of the Uruguay Round a number of single-sector negotiations were undertaken. Some of these were part of the “built-in agenda” of unresolved service talks, others were undertaken separately.⁹ These negotiations have been the only real proving ground for sector-by-sector talks as an alternative format of multilateral negotiation. Their success, to the extent that it has occurred, poses an important challenge to the theories described above. These negotiations therefore merit further examination.

With the close of the Uruguay Round, deadlines in 1995 and 1996 were adopted for further talks on movement of natural persons, financial services, basic telecommunications, and maritime services.¹⁰ Not a single one of these deadlines was met. Negotiations over the movement of natural persons were delayed, and those on maritime services came to a complete halt.

In financial services, the United States decided in June 1995 that the offers other countries had made were inadequate and withdrew its offers. The European Union crafted an interim agreement to salvage the negotiations, and a final agreement was reached December 13, 1997. Various explanations are offered for the progress that was made. The most persuasive argument is that the Asian financial crisis commenced that summer (Dobson and Jacquet 1998).¹¹ At the heart of the crisis were concerns about the regulation and openness of Asian financial service sectors. By the fall, all participants were anxious to avoid further failures, as the financial services negotiations surely would have been.

The mere conclusion of an agreement does not mean that it was a success. The difficulties of assessing the extent of services liberalization described above apply to financial services as well. One expert conclusion was grim: “Save for actual advances in the field of insurance services, [the Financial Services Agreement] barely goes beyond binding the status quo. . . . Remarkable though it was in terms of the negotiating challenge, especially in light of the Asian financial crisis, the FSA does not appear to provide significant new momentum on market opening” (Dobson and Jacquet 1998, 90).

The negotiations on basic telecommunications had a similar history. In April 1996 the United States judged the package of offers inadequate and walked out of negotiations (Aronson 1998). On February 15, 1997, agreement was reached. It is difficult to assess the extent of market opening or the extent to which the negotiations drove this liberalization.¹²

In both financial services and telecommunications, markets in the European Union and the United States were reasonably open to competition; markets in Japan and the developing nations were more protected. Furthermore, the most competitive firms were based in the European Union and the United States; the

developing nations had relatively little interest in reciprocal market access. Thus the difficulty in reaching agreements when these negotiations were carried on in isolation was entirely predictable. Under the General Agreement on Trade in Services (GATS), it was possible to sign an agreement without undertaking liberalization or even locking in the status quo.

The Information Technology Agreement, which was concluded in March 1997, has been heralded as a prime example of successful negotiations outside of the standard round format. Although the negotiations were held under the auspices of the WTO, they were concentrated in a single sector and were not part of the Uruguay Round's built-in agenda. U.S. Trade Representative Charlene Barshefsky said of the Information Technology Agreement, "The significance of the agreement is without comparison. At no time in the history of the trading system have so many countries united to open up trade in a single sector by eliminating duties across the board" (cited in Wilson 1998, 75).

There is no doubt that a significant amount of trade liberalization occurred under the Information Technology Agreement and that it represents a major achievement for the WTO. On its face, the ease with which the agreement was reached seems to contradict the theoretical claims that broader rounds and linkages between sectors are necessary for significant multilateral liberalization. In fact, the history of the Information Technology Agreement reveals some reasons to doubt that the sectoral approach can provide a worthy substitute for a broader round.

The agreement originated with an initiative pushed by U.S. information technology producers.¹³ In 1993, at the conclusion of Uruguay Round negotiations, the United States requested a lowering of European barriers to goods such as semiconductors. The issue was raised again in early 1995 in bilateral negotiations between the European Union and the United States, and it was on the agenda of the spring 1996 meeting of the Quad countries (Canada, the European Union, Japan and the United States). At this stage, the United States pushed for the agreement to be multilateral. Prospects were bolstered when the agreement was endorsed at the Asia-Pacific Economic Cooperation summit in November 1996.

Negotiations took place at the Singapore Ministerial Meeting of the WTO, in December 1996; the agreement reached was one of the centerpieces of the meeting. The Singapore agreement was conditional. As a means of addressing the free rider problem that had plagued the contemporaneous negotiations in telecommunications and financial services, it had been agreed that the Information Technology Agreement would be concluded only if a sufficient number of countries agreed to participate. Eventually, 43 WTO member countries joined the agreement, representing about 93 percent of world trade in the sector (WTO 1997).

To assess the implications of the Information Technology Agreement for the shape of future negotiations, it is important to understand why it succeeded. Two major reasons suggest that the case for broad negotiations remains intact. First, the information technology sector itself is sufficiently broad and production is sufficiently dispersed that most nations were both buyers and sellers of information technology products. Thus it was possible to agree to reciprocal market access even within the sector (Johnstone 1997).¹⁴ Second, it turns out that the agreement was not confined to the information technology sector at all; final agreement came about only when the United States agreed to lower its barriers to European liquor exports. During the negotiations, the European negotiator insisted on a phaseout of tariffs on brown and white distilled spirits and liqueurs over a time period similar to that for information technology products; the United States agreed. This concession was apparently necessary to overcome French resistance to the Information Technology Agreement (European Report 1996).¹⁵

Thus the success of sectoral negotiations has been more apparent than real. Talks on the movement of natural persons and on maritime services failed completely. Talks on telecommunications and financial services were very difficult, and the extent of liberalization has been questioned. The Information Technology Agreement looks like the best case, but it featured substantial intraindustry trade and even so required an intersectoral deal for completion.

For the sake of argument, suppose that the spirits component of the Information Technology Agreement was trivial. Intraindustry trade has grown increasingly important in the past several decades; why should it not allow for new bargaining patterns? Is there anything wrong with reaping gains in an important sector without waiting for other negotiations to conclude? If an event such as the Asian financial crisis creates a surge of interest in liberalization, why not seize the moment?

Taking these questions in turn, there is nothing inherently wrong in using trade-offs within a sector to reach an agreement. In fact, the practice bolsters the theoretical arguments advanced earlier. To have a serious discussion of whether talks should include one or more sectors, it is necessary to define "a sector." The theoretical arguments would suggest a homogeneous product, such that one country would be an exporter and another would be an importer. This might imply a single line in a tariff schedule. By this reasoning, an area such as financial services, which includes banking, insurance, and investment services, is really a bundle of sectors linked under a single rubric. This is more than mere pedantry; it shows that the true argument concerns not whether there should be one or two sectors but rather how many different sectors one wants to include. Section 14.2 of this chapter addresses this issue explicitly.

First, though, we return to the question of whether there is any harm in settling one sector before the others. There is. Consider the example of a sector such as information technology, in which there is broad willingness to liberalize. This is exactly where one would expect to find slack in countries' incentive constraints. That slack could be put to good use by allowing other, more difficult sectors (such as agriculture) to achieve greater liberalization. This has been demonstrated generally in recent work by Inderst (2000). In a bargaining game, he gives an example with two areas of negotiation. In one, both participants can gain, but there is a trade-off between one participant's gain and the other's (it is over this division of the spoils that they are bargaining). In the other sector, both participants gain, but the division is preordained. Thus the first sector is the controversial one, while the second is the easy one. Inderst shows that except for a rare symmetric case, there will be different outcomes to the bargaining for separate versus simultaneous negotiations. The intuition is that the participant who gains more from the easy sector deal will suffer more if it is delayed. This gives leverage to the other participant in the more difficult negotiation when the two sectors are linked. Only when the participants are equally anxious to reach the easy accord will simultaneous and separate negotiations reach the same result. This hardly seems like an apt description of the single-sector negotiations of the late 1990s.¹⁶

In less abstract terms, the problem with the Financial Services Agreement or the Information Technology Agreement is that they removed strong advocates of liberalization from future negotiations. Financial lobbyists in the United States who might have pushed for a package that bundled financial services with reform of antidumping laws will no longer have much incentive to be involved. Thus an early harvest can damage other crops.

Of course, one can hardly argue that no agreement should ever be reached before all potential agreements are settled. Such an extreme stance would have denied the benefits of the postwar liberalization that took place under the GATT (since there are still, quite clearly, recalcitrant protected sectors). It will be the task of section 14.2 to look for a middle ground.

14.1.4 Are There Cross-Sectoral Trade-Offs?

The previous subsection tested the theory of cross-sectoral linkages with a purported counterexample. This subsection looks more directly at whether there is evidence that such linkages occur.

At first glance it might seem that the theory falters. The Punta del Este Declaration that launched the Uruguay Round stated that "balanced concessions should be sought within broad trading areas and subjects to be negotiated in order

to avoid unwarranted cross-sectoral demands” (see http://www.sice.oas.org/trade/Punta_e.asp). Furthermore, in an analysis based on interviews with Uruguay Round negotiators, Finger, Reincke, and Castro (1999) find that those negotiators did not carefully tally gains and losses in the way the theory suggests.

This last point is reminiscent of a standard and more central challenge to economic theory that notes that individuals are not observed going around maximizing their utility subject to a budget constraint. This criticism was addressed decades ago by Milton Friedman (1953), who argued that the theory was still useful as long as individuals behaved *as if* they were doing the calculations. In fact, Finger, Reincke, and Castro (1999) conclude that “there were obvious trade-offs from one part of the [Uruguay Round] negotiations to another” (10).

How could such trade-offs occur if the negotiating groups are explicitly separate and instructed to strive for balance within? They occur because ultimately a minister or chief negotiator considers the package as a whole. No matter how hard negotiators on textiles and apparel might have worked to achieve internal balance, there was not much by way of market access that developing countries could have given the developed countries to compensate for the political costs of ending the Multifiber Arrangement. Similarly, it is hard to imagine what the developed countries might have offered the developing countries within the arena of intellectual property. Whether or not negotiators are quantifying their gains and losses precisely, the U.S. trade representative must have looked at those two agreements and seen textiles as a net loss and TRIPS as a net gain. To the extent that the two agreements packaged together were seen as acceptable, an implicit cross-sectoral trade-off was made.¹⁷

14.2 How Many Sectors?

Cross-sectoral linkage is absolutely essential to successful multilateral negotiations. But just how broad do such negotiations need to be? I start from an extreme position and then consider reasons for retreat. The reasoning of Bernheim and Whinston (1990) would suggest that the broader the negotiations the better. Suppose there is a proposed agenda with a given number of sectors and one asks what costs and benefits there might be from adding another sector. If the existing level of liberalization is only just supported in the additional sector (that is, there is no slack in the incentive constraint), there will be no gain from including it in broad talks or any cost of doing so. Thus including another sector leaves participants no worse off. If there is slack in the incentive constraint, including it will leave participants strictly better off, since it will allow for greater liberalization in the sectors of the initial agenda. Thus in the abstract, there is an appeal to negotiations of unlimited breadth.

The first objection to an overly broad round is that it would put an excessive burden on developing countries. Numerous commentators have described the strain that the Uruguay Round agreements caused.¹⁸ Schott and Watal (2000) attribute this to the Single Undertaking requirement that countries participate in all of the negotiations. It was difficult for poor countries to maintain representation at the multiple negotiating groups of the Uruguay Round, much less at an even broader round.

While this concern is very real, it is worth noting its limits. Developing nations have found it difficult to implement agreements, such as the agreement on customs valuation, but this should not serve as an argument against broad negotiations. The concern should be the amount of time allocated for developing countries to phase in reforms. The relevant constraint for determining the scope of talks is the limit on participants' negotiating ability, including the analytical apparatus that supports the negotiators. To the extent that there are limits on countries' capacity to implement agreements, one would expect that a broader round would require longer phase-in allowances for countries that are constrained.

This capacity argument for limiting a round's scope is quite different from the complexity complaint frequently heard from the United States. The contention is that the increased complexity of rounds has led to their increased length. In the context of the major developed countries, this is implausible. The Uruguay Round was to conclude at the 1990 Ministerial Meeting in Brussels. Had it done so, the round would have been just four years long. The delay was caused neither by the inability of Europe or the United States to master the complexities of the issues involved nor by a shortage of Quad country negotiators who might attend talks. Delay was attributable to impasses on key issues, particularly agriculture. Preeg notes that with many sensitive issues on the table, "recalcitrant negotiators, under constituent pressure not to be forthcoming, tend to hold back unless faced with some form of threat or ultimatum" (1995, 188). The spacing of those deadlines, which most frequently came from the expiration of U.S. fast-track negotiating authority, cannot be ascribed to the breadth of the talks.

14.2.1 Impasse, the Single Undertaking, and Pandora's Box

There is one sense in which the breadth of the negotiations could be directly linked to the length of the talks. Suppose a sector is included in which a major participant feels that it absolutely cannot adopt any policy more liberal than the status quo. Coupled with the Single Undertaking requirement that nothing is agreed on until everything is agreed on, this would seem to offer the potential of a never-ending round.

The question hinges on a more precise definition of the Single Undertaking requirement. What does it mean that everything must be agreed on? Surely those countries that managed to put the controversial issue on the agenda would not be pleased to leave the round with the status quo intact. Yet the obstinate country, by assumption, will not back down. If the interpretation of the Single Undertaking is that it requires measurable liberalization from the status quo, an impasse will occur. If, instead, it allows for empty agreements, it should not delay the conclusion of the round. But the possibility of empty agreements casts serious doubt on the importance of the Single Undertaking as a concept.

I define an "empty agreement" as one that requires no liberalization on the part of some or all of the participants in the talks. For world welfare it matters whether one country or all countries are exempted from obligation, so one can distinguish between partially empty and completely empty agreements. For the analysis of the Single Undertaking requirement, though, the distinction makes no difference. Sadly, there are abundant examples of empty agreements. The maritime services sector was under the domain of the Uruguay Round GATS negotiations, but no liberalization was undertaken by the end of the round or after its conclusion. The Uruguay Round also featured four plurilateral agreements, in which not all countries participated; these could be considered examples of partially empty agreements, since nothing was required of nonsignatories. It has been argued that the agreement on agriculture achieved little in the way of liberalization, though it may have set the stage for future liberalization through measures such as tariffication.¹⁹

How was the Uruguay Round agreed upon, since there were clearly sectors in which no liberalization took place and others in which not all countries participated? A strict interpretation of the Single Undertaking requirement would say that it should not have been concluded. In practice, though, the round was settled when there was a sufficient balance of concessions to satisfy all participants. This is not to argue that the Single Undertaking requirement had no effect at all. As Finger, Reincke, and Castro write, "The all-or-nothing character of the WTO proposal required that a country accept the disciplines of all the agreements if it became a WTO member. . . . Accepting all of these disciplines could reasonably be interpreted by trading partners as worth as much as another percentage point coverage of tariff reduction" (1999, 10). While this is true, it is important to remember that the content of those agreements was endogenously determined. Had the agreements required the repeal of the Jones Act, it is unlikely that the United States would have pursued membership.²⁰

A closely related question is whether the presence of a topic on the negotiating agenda makes movement on that issue significantly more likely. In the case of maritime services, it did not. One might ask whether the same immunity would work for environmental or labor standards. Krueger asserts that such negotiations

might have a life of their own, noting that “it is all too easy to strengthen labor standards once they are accepted as a part of the WTO” (1999, 915). This seems to be one major rationale for the strong opposition by developing countries to allowing these new issues on the agenda. Yet Krueger also argues that “developing countries have a strong interest in preventing developed countries from perceiving that they will not negotiate regarding the environment at all; such a stand could induce environmentalists to push even harder for trade-enforced environmental measures” (926). Thus a critical question that is left unanswered is whether a country’s ability to stand firm on an issue is altered by the inclusion of that issue on a negotiating agenda. The exclusion of an issue from an agenda necessarily precludes any movement on it, but that is quite different from saying that inclusion leads to movement.²¹ Of course, developing countries might find it in their interest to make concessions on environmental measures, depending on the liberalization they are offered in return. That would be an argument for a broader agenda.

14.2.2 Natural Demarcations

An alternative rationale for excluding labor and environmental issues would be that harmonization of such policies is unnecessary to achieve gains from trade and may well harm global welfare. One might look for a natural demarcation between issues that are central to achieving gains from trade (for example, the removal of explicit barriers to goods and services exchange) and those that are not (for example, the harmonization of minimum wages across countries).

There are a number of difficulties in drawing such a line. One could try to distinguish between rules that concern products and those that concern the process by which those products were made (the former being worthy of negotiation, the latter not). However, this line has already been crossed with negotiations on countervailing duties and TRIPS. Separating domestic matters from trade flows is not easy either, as any policy that alters domestic consumption or production levels will affect trade. Krugman (1997) acknowledges this and points out that the search for a logical separation of negotiating issues is fundamentally flawed. Even when countries reciprocally lower tariff barriers, the mercantilist principle behind the exchange—that market opening is bad but that one is compensated through access to other countries’ markets—is misguided. Thus to say that harmonization of labor laws is also misguided does not set it apart.²²

The exchange of tariff concessions can be distinguished from labor law harmonization in their ultimate effect on world welfare. The former will likely raise all participants’ welfare and thereby raise world welfare. The latter may harm all participants’ welfare and thereby lower world welfare. There are also scenarios,

such as the emission of transboundary pollution, in which limits would harm one country's welfare while helping other countries and raising world welfare.

Maskus (2002) assesses TRIPS, competition policy, labor standards, and environmental standards on a number of related criteria: trade impacts, international externalities, policy coordination failures, and meaningful dispute resolution. He finds that "overall, the 'grand rank' . . . provides an advantage to competition policy over environmental regulation. The criteria adopted here reject core labor rights as an appropriate area for the WTO" (142). His arguments, while persuasive, also illustrate the extent to which suitability for inclusion is a matter of degree rather than a binary property.

14.2.3 Ripe for Negotiation and a Vehicle for Transfers

This section began with everything on the hypothetical negotiating table and then attempted to whittle down the agenda by considering negotiating costs, bargaining impasses, runaway talks, and welfare considerations. In the end, what is left is the basic idea of linked negotiations to allow welfare-enhancing exchanges. Given the substantial costs of negotiation to some participants, negotiations should be kept as limited as possible without undercutting the prospects for a deal.

To illustrate the point, consider an agenda with 12 potential topics. If it turns out that this agenda could be divided in half and the same outcome supported in each half, undertaking a six-topic round would be harmless. One can assess the likelihood that the outcome will be preserved by examining the nature of concessions. If all of the necessary trade-offs occur within the smaller groupings of topics, the division will be harmless. If, instead, one country's concessions made on the first six topics were justified by concessions won on the seventh topic, the split would not preserve the outcome.

This criterion would rule out single-sector negotiations such as the Information Technology Agreement. As argued above, it is very likely that other countries could have won further liberalization from strong proponents of that agreement, such as the United States, had the negotiations been bundled with other issues. The criterion would also mean that it is costless to exclude issues on which an impasse is highly likely—the outcome of the Uruguay Round would have been the same whether or not maritime services had been discussed. This consideration might well exclude labor standards from talks. Finally, the criterion could allow the inclusion of transboundary environmental concerns. One of the central problems in reaching global agreements on environmental policy is the uneven incidence of the measures under consideration. This problem could be addressed by properly allocating tradable permits, but the same result might also be achieved by allowing compensation to take place through trade concessions.

14.3 The Single Undertaking

The previous section prescribed a broad negotiating agenda, leaving open the question of whether such a round would have a Single Undertaking requirement or whether countries would sign on only to those parts they liked (variable geometry). Even if one ignores the arguments presented above on the limited impact of the Uruguay Round Single Undertaking requirement, it is difficult to see how insistence on a Single Undertaking could be repeated.

Though the institution of the WTO was not proposed until relatively late in the Uruguay Round, it provided a ready vehicle for enforcing the Single Undertaking. A country may have been a contracting party to the GATT, but it could not become a member of the WTO unless it assented to all of the requisite agreements. In all future rounds, one could request that all WTO members sign all parts of the ensuing accord, but what means of enforcement would there be? Would recalcitrant countries be expelled from the WTO? That would certainly alter the bargaining dynamics, but it seems unlikely. One might achieve the same effect by replacing the WTO with a new organization, WTO-2, and allowing in only those members that undertook all the new agreements. That, too, is implausible and would lead to odd dynamics (a country might choose to wait until WTO-5 to join, or it might make different concessions in the knowledge that it might exit at the next incarnation).

The Cancun Ministerial Meeting illustrated the importance of this issue. Disagreements over the scope of the round were not notably between the major trading nations, such as Europe, Japan, and the United States. Instead, coalitions of developing nations (the Group of 20, prominently) were at the heart of fights to narrow the scope of the round in some areas (the Singapore issues) and expand it in others (specific measures on cotton). The effect was to halt multilateral progress for months.

Without any ready means of enforcing a Single Undertaking constraint, one is left with variable geometry. This is not as bad as it might seem: even in the Uruguay Round, certain issues were addressed with plurilateral agreements and certain negotiations resulted in empty agreements. The most common concern about variable geometry is the potential for free riders—countries that enjoy the benefits of an agreement without undertaking the accompanying obligations.

I consider two scenarios: one in which nonsignatories cannot be effectively excluded (unconditional MFN status prevails) and one in which exclusion is possible (conditional MFN status). If countries cannot be excluded from enjoying the benefits of an agreement, participation can be enforced, as it was in some of the post-Uruguay Round sectoral negotiations. The United States declared that unless a critical mass of countries participated, it would not sign the agreement. If

the agreements are truly welfare enhancing, countries should eventually find it in their own interests to join.²³

If countries can be excluded (by adopting a conditional MFN approach), new distortions may be introduced into the world trading system. The problem is akin to the one raised by preferential trade agreements: because of trade preferences, consumers may buy goods from a high-cost producer. A key difference, though, between a conditional MFN agreement under the WTO and a preferential trade agreement is the ease with which excluded countries could gain inclusion. Ideally, the conditional MFN agreement would require signatories to automatically extend MFN treatment to any country that subsequently wishes to sign. In contrast, gaining admission to a preferential trade agreement can be exceedingly difficult.

14.4 Concluding Remarks

This chapter has argued that linkages across issues are a central component of international trade negotiations. This is true whether one considers governments as unified entities promoting national welfare or whether one takes into account the role of interest groups in shaping government preferences. The landscape of negotiations changed over the life span of the GATT, as issues that were once considered domestic have made their way onto the agenda and as talks shifted from readily quantifiable tariffs toward more procedural questions, such as government procurement and antidumping policy. None of this diminishes the possibility of cross-sectoral trade-offs, however. The WTO can still play a vital role in facilitating the exchange of concessions across issues in a way that increases world welfare.

While the added complexity of a multi-issue negotiation does put a burden on negotiating countries, a broad round is preferable to a narrow one, because it may allow otherwise unattainable deals to be concluded. Countries' own efforts to ensure that their concessions are offset by gains should be sufficient to ensure the breadth of participation. An attempt to impose a Single Undertaking requirement would likely fail.

Notes

1. This is a slight exaggeration. In fact, as discussed below, there were four plurilateral agreements—on trade in civil aircraft, government procurement, dairy, and bovine meat. The latter two have since been abolished.

2. To the extent that signatories are able to discriminate among trading partners (conditional MFN), the third country will neither incur the costs nor enjoy the benefits of the agreement. This is less troubling from the perspective of maintaining incentives to liberalize.

3. While textiles and apparel liberalization will indisputably raise developed country welfare, it is not as clear that less developed countries will gain from the TRIPS accord.

4. See Whalley and Hamilton (1996) for computable general equilibrium estimates of those gains.

5. Fifteen years elapsed between the end of the Tokyo Round, in 1979, and the conclusion of the Uruguay Round, in 1994. The Uruguay Round began in 1986, but the United States suggested a new round as early as 1981 (Preeg 1995). Preeg notes that the six-year Tokyo Round led to "GATT fatigue," leading officials to wonder "if a continuous process of single-issue negotiations within the GATT would be preferable" (27). According to him, "The most persistent criticism of the GATT round approach . . . is that it simply takes too long" (186).

6. Schott and Watal do not advocate sector-by-sector negotiation as a remedy. Instead, they recommend the creation of a WTO steering committee to set the agenda. That idea is beyond the scope of this chapter.

7. For a good general reference on bargaining theory, see Muthoo (1999).

8. Fearon (1998) provides a thorough treatment of this proposition.

9. This section draws heavily on Khalid, Levy, and Saleem 1999.

10. For a more detailed history, see Dobson and Jacquet (1998).

11. Dobson and Jacquet also cite better cooperation between the European Union and the United States and more effective coordination among private lobbying interests.

12. For a debate about the significance of the Basic Telecommunications Agreement, see Drake and Noam (1998). Their skeptical view is that the agreement largely codified liberalization that was occurring anyway.

13. This history draws on Wilson (1998).

14. In nations that do not produce information technology, these goods are often intermediate products rather than consumer goods, so producers that use information technology could be expected to press their governments for liberalization. Evidence that this is the case comes from the exclusion of music CDs and consumer electronics, both within the information technology sector but not very useful in production.

15. A European spokesperson was quoted as saying, "We're not trying to pretend that whisky and cognac are IT products. We're saying, merely, the more the merrier."

16. This mechanism may also address the concern that developing countries made excessive concessions in the Uruguay Round. If those countries placed greater weight on membership in the WTO as an important foreign policy measure (a noncontroversial part of negotiations), linkage of membership with the broad range of agreements would allow the less interested developed countries to exploit the slack in the incentive constraint and achieve greater concessions in areas of concern to them, such as TRIPS. This is an inescapable concomitant of linked negotiations.

17. It is exactly this capacity of higher-ranking ministers to take a broader view and to recognize these trade-offs that leads Wolfe (1996) to call for their greater involvement in talks.

18. For one example that cites others, see Chadha and others (2000).

19. For a thorough discussion of the agreement on agriculture, see Josling (1998), who writes that the level of protection was not significantly reduced.

20. The Jones Act, which governs maritime services in the United States, is very sensitive politically. The U.S. Congress failed to ratify the original International Trade Organization over complaints about its coverage.

21. There is a substantial literature on agenda setting and the effects it can have on outcomes. Most frequently, these effects come through the structure of the decision-making process (for example, a committee chair's decision to present Proposal A and then Proposal B, without any possibility of return to Proposal A or introduction of a Proposal C). In the less structured setting of WTO negotiations, it is less clear how these arguments apply.

22. Krugman reviews a very useful collection of articles that consider the need for harmonization (Bhagwati and Hudec 1996).

23. An example was the unilateral trade reform undertaken by developing countries in the 1980s and 1990s, despite their exemption from reciprocal obligation under special and differential treatment.

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INTERNATIONAL COOPERATION ON DOMESTIC POLICIES: LESSONS FROM THE WTO COMPETITION POLICY DEBATE

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While the focus of most international trade agreements continues to be primarily on national trade policies that impose barriers to market access, negotiating attention has been increasingly expanding to include so-called behind-the-border policies—domestic policies that may have only indirect effects on trade (market access), if any. Examples include policies on labor, the environment, competition, investment, and intellectual property protection. The negotiating agenda in such cases often revolves around determination of what policy should or should not be, generally, but not necessarily, motivated by negative externalities.

The extension of trade agreements to behind-the-border policies is controversial. A key question confronting governments is where to draw the boundary of the World Trade Organization (WTO). More specifically, what type of international cooperation is best pursued through trade agreements? No general answers are possible. Issue-specific analysis is needed of the implications of status quo domestic policies, the existence and magnitude of any negative spillovers, and the impact (costs and benefits) of alternative forms of international cooperation (voluntary versus binding) on these two dimensions.

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The focus of this chapter is on one area of domestic policy that has been the subject of international discussions: competition policy. This was one of the four Singapore issues that were suggested for negotiation at the 1996 WTO Ministerial Meeting. The competition policy case suggests a number of insights regarding international cooperation on behind-the-border policies:

- If the focus of discussions and potential negotiations is not clearly on negative spillovers or market access constraints associated with a set of policies (or there are no such spillovers), the rationale for negotiating rules and disciplines for such policies is weakened.¹ The argument that a particular set of policies is important for “development” is simply not compelling.² Virtually any policy domain can be argued to be important for development. In our view, the major externality dimensions that exist in the competition policy domain were not put squarely on the table. Most proposals for negotiations stressed national enforcement-related disciplines, including as a mechanism through which to deal with international cartels (including export cartels). International cooperation to address negative spillovers caused by national competition policy enforcement was generally to be on a voluntary basis.³
- If the primary rationale driving negotiation is not the attenuation of negative policy spillovers (that is, the case made is based on “systemic” rationales), there must be significant *domestic* political economy problems that impede unilateral action. However, incentives for multilateral enforcement will be weak if there are no spillovers, implying that in such cases a key element of the agenda must be the establishment of *domestic* enforcement mechanisms. In principle, this is the case with antitrust. How valuable internationally binding commitments are in this type of situation depends on the circumstances of individual countries. In the run-up to Cancun, many countries—including many that already had antitrust legislation (some 100 at last count)—appear to have concluded that the payoff was small (Epstein and Greve 2004).
- A necessary condition for undertaking binding commitments, whether motivated by spillovers or domestic political economy, is experience with the policy. Countries need to be “comfortable” with an issue and knowledgeable about the implications of proposed rule making. In the competition case, this minimum comfort level often did not exist.
- Mechanisms involving voluntary exchange of information, peer review, and so forth may be a precondition for governments (stakeholders) to identify where formal cooperation (rules) is beneficial. Indeed, this may be a more effective and efficient vehicle for cooperation. One result of the WTO Working Group discussions was that voluntary forums for cooperation were established or strengthened. The prime example is the International Competition Network, a

forum in which competition enforcers and lawyers collaborate on guidelines for and assessments of national competition regimes. Other examples are the Organisation for Economic Co-operation and Development (OECD), Asia-Pacific Economic Cooperation (APEC), and United Nations Conference on Trade and Development (UNCTAD).⁴ These entities operate outside the WTO and involve formally nonbinding (enforceable) cooperation.

In section 15.1 we discuss the rationales for international cooperation on domestic policies, specifically what role trade agreements could play. In section 15.2 we analyze the WTO competition policy case.

15.1 Why Cooperate on Behind-the-Border Policies?

The behind-the-border trade agenda is a broad concept that captures those aspects of the legal and regulatory environment, policies, and institutions that affect the ability of firms to compete at home and abroad. An example is policies and institutions that deal with standards for quality, health, and safety—increasingly a precondition for contesting export markets.

Much of the behind-the-border agenda is related to services. The cost, quality, and variety of services available to firms and consumers is a major factor determining the competitiveness of firms. Many of the “backbone” services that are critical to development—transport, energy, telecommunications, finance—are key inputs into production. Services are activities in which there is often need for some type of regulation to address market failures or achieve social (noneconomic) objectives. However, ensuring that markets are contestable—that new suppliers can enter the market and firms can connect to networks at a reasonable price, apply new technologies, and so forth—is an equally important policy challenge.

It is well known that trade (and trade liberalization) may do little to stimulate growth in economies with distorted product, capital, or labor markets, as a study by Bolaky and Freund (2004) illustrates. They find that increased openness to trade is positively correlated with income in all countries but associated with a lower standard of living in economies that heavily regulate new entry or impose high costs on restructuring.⁵ Such regulations prevent resources from moving to the most productive sectors or firms. A large body of microeconomic evidence finds that entry and exit of firms (turnover rates) is a key determinant of positive productivity effects of trade openness (see, for example, the studies in Roberts and Tybout 1996). Thus trade liberalization needs to be complemented by measures that facilitate or allow reallocation of factors of production, in particular policies to promote domestic competition (entry and exit) and labor market flexibility.

A basic question is how trade agreements might help governments deal with these types of domestic distortions and strengthen trade-related institutions. Of course, reducing transaction costs and improving policies can be pursued unilaterally, by adopting international standards and better practices. In fact, many developing countries have made autonomous decisions to adopt international standards or to recognize or adopt the regulatory norms and systems applied by major trading partners, such as the European Union (EU) and the United States. This is an example of what can be called “policy integration”—deliberate actions by governments to reduce the market-segmenting effect of regulatory regimes. Unilateral action, voluntary cooperation, and binding trade agreements are all routes toward such integration.

Policy integration complements market access liberalization (the removal of discrimination at the border) and national treatment (governments treating foreign products or producers that enter their territory the same as domestic counterparts in terms of policy). It can improve the efficiency of national policies, reduce transactions costs, and save resources otherwise wasted in unproductive activities and removing (nontrade) policies that segment national markets for similar goods and services. As is the case for trade barriers, policy integration often reduces the detrimental impact of national policies on partner countries (terms of trade externalities). The policy itself may create negative spillovers, or cooperation may offer scope to attenuate externalities associated with another policy (that is, issue linkage).

International cooperation can take many forms. Coordination—efforts by governments or regulatory bodies to agree to (and implement) a norm or rule—generally implies no binding commitment on the part of governments; participation does not require enforcement mechanisms in that there are no incentives to “defect” once agreement has been reached.⁶ In contrast, information sharing and other types of mutual assistance (legal or otherwise) may require formal agreements. The application of the principle of positive comity in competition law cases is an example.⁷ Here we are no longer in the coordination game setting, as there are likely to be situations in which reneging on commitments may be advantageous. The same is true in the case of harmonization, a more far-reaching form of cooperation that involves unilateral adoption by one country of another’s set of rules or negotiation of a common set of disciplines.

Policy integration is generally motivated by political economy, externality, or capacity considerations. It can be used to overcome domestic political constraints that impede adoption of what are regarded as good policies and enhance the credibility of domestic reform efforts. For a developing country, policy integration in a trade agreement context may help alter policies that reduce economic growth. Policy integration may entail the adoption of better practices, reducing

uncertainty or anchoring expectations by increasing the probability of a sustained pro-growth policy environment.

In practice, international cooperation will be driven mostly by the existence of negative externalities. Domestic regulations may seek to segment markets (impeding foreign firms from competing with national ones), or segmentation may simply be a side effect. For example, administrative requirements may be duplicative or redundant. Tax authorities in an exporting country may require data that are very similar to that demanded by the importer's customs officials but in a different format. This imposes additional transactions costs (spillovers) on enterprises that engage in international exchange, raising consumer prices. The same type of issue can arise in the competition policy context. Multiple jurisdictions with varying notification and documentation requirements and different standards give rise to additional (redundant) costs for the firms involved.⁸

Historically, voluntary (multilateral) cooperation between states to reduce such transactions costs and market segmentation has been the dominant form of inter-governmental cooperation. More than 30 intergovernmental organizations emerged between 1860 and 1914, covering international mail delivery (1863), marine signaling (1864), technical railway standards (1883), ocean telegraphy (1897), and aerial navigation (1910) (Murphy 1994). International interconnection—a key requirement for effective competition—was often a major objective. Norms agreed to under the auspices of the International Telecommunications Union permitted cross-border delivery of telegrams. The Radiotelegraph Union aimed to prevent a global radio monopoly by requiring interconnection across different technologies. International railway unions promoted networks by standardizing rolling stock, allowing companies to use one another's rolling stock, and enforcing a single bill of lading, so that a single document could be used for multicountry shipments (Pollard 1974). After World War II intergovernmental organizations proliferated further, with many aiming to foster economic growth by developing norms for “good” policy and cooperating to reduce transactions costs. These efforts ranged from technical requirements for maritime transport (the International Maritime Organization) to customs procedures (the World Customs Organization) to labor rights and working conditions (the International Labour Organisation) to capital adequacy standards for banks (the Bank for International Settlements).⁹

The distinguishing feature of multilateral trade agreements is that they are instruments through which cooperation can be made binding. Formal trade agreements differ from voluntary cooperation (even treaty-based cooperation) by offering binding enforcement mechanisms. A consequence is that arguments in favor of inclusion of an issue in a trade agreement such as the WTO must address the question of whether binding dispute settlement is appropriate and if so what

type of enforcement instrument (remedy and retaliatory threat) is most efficient. The classic answer offered by economists is that enforcement is necessary to allow countries to cooperate in the first place. This argument is straightforward if countries negotiate about policies that impose negative spillovers. Assuming that these policies are in a country's national interest (enhance welfare), giving up the right to use them comes at a cost, which must be offset by greater gains from concessions made by partners (the classic gains from trade). These concessions must be enforceable or the deal will unravel.¹⁰

In the absence of international spillovers, for cooperation in the WTO to make sense there must be a constraint that prevents governments from adopting "good" policies. In practice, such constraints are likely to reflect political economy forces. If they do, a trade agreement may support the ability of governments to implement and maintain a superior policy in the face of resistance by domestic interest groups. For enforcement to be effective in such cases, dispute settlement procedures must establish a credible threat that reneging—giving in to domestic pressure—will give rise to costs. In the WTO case, such costs arise due to the need to compensate foreign countries that are affected.

If an issue does not create negative spillovers, the incentives to use the WTO mechanism will be weaker; if foreign interests are not directly affected, they have no incentives to bring a case to the WTO. Thus a policy issue must have an externality dimension for the WTO framework to work (see Bagwell and Staiger 2002). A corollary of this argument is that if there are no negative pecuniary spillovers, a key need from an enforcement perspective is the establishment of *domestic* enforcement mechanisms that provide access to affected *domestic* interests. The establishment of such domestic enforcement mechanisms has to be part of the negotiating agenda—as was the case with the Agreement on Government Procurement, which established domestic bid challenge mechanisms as part of its enforcement technology (see Hoekman and Mavroidis 1997).

The foregoing suggests that two key questions need to be answered. First, do negative international spillovers arise in the context of competition policy, and how large are they? Second, if the rationale for cooperation turns on domestic political economy rationales, are there domestic stakeholders who have an interest in using, and having access to, domestic enforcement devices?

15.2 The Competition Policy Case

Domestic competition law and policy can give rise to a variety of international external effects. A merger between foreign firms may increase prices on export markets, to the detriment of foreign welfare, if the costs to consumers in the foreign market outweigh any increase in producer surplus of local competitors

(Ordover and Willig 1986).¹¹ National tolerance or encouragement of export cartels may have this as an explicit objective (Auquier and Caves 1979). Firms may also collude through an illegal international cartel in order to raise prices in export markets. Entry barriers in downstream industries, such as distribution, may impede effective market access. Duplicative or conflicting merger standards increase transactions costs and create regulatory uncertainty (Scherer 1984). All of these factors may act to alter the terms of trade by restricting output or raising prices—the types of effects associated with market access restrictions. The market access or terms-of-trade effects of national antitrust therefore offer one potentially compelling rationale for including competition law disciplines in the WTO (Bagwell and Staiger 2002).

It is not surprising therefore that competition issues have been on the international agenda for many years. The draft of the charter to create an International Trade Organization in the late 1940s included a chapter on competition, reflecting concerns—driven by German cartels and Japanese *zaibatsu* in the prewar period—that international cartels and restrictive business practices can block market access. In the 1970s an active discussion took place in the United Nations on the need to discipline restrictive business practices by multinational enterprises. These talks resulted in a best-efforts set of principles (the Set of Multilaterally Agreed Equitable Principles and Rules for the Control of Restrictive Business Practices) that were adopted by the United Nations in 1980.

Interest in this issue reemerged in the 1980s, due to perceptions that restrictive distribution practices and conglomerates in Japan (*keiretsu*) impeded access to markets (the Kodak-Fuji dispute is a noteworthy example). In the 1990s disputes between competition authorities on “megamergers”—for example, Boeing–McDonnell Douglas, Worldcom–Sprint, GE–Honeywell—as well as a resurgent interest in combating cartels reinvigorated calls for multilateral disciplines on competition policy. One reflection of this resurgence was an OECD recommendation on hard-core cartels (OECD 1998).¹²

Developments in the WTO: A Short History

In 1997 a WTO working group was established to investigate the relationship between trade and competition policies. The 2001 WTO Ministerial Meeting in Doha agreed that negotiations on this subject were to be launched at the Fifth WTO Ministerial Meeting in 2003, on the basis of modalities to be agreed to by consensus. No such consensus emerged at the 2003 Cancun meeting (disagreement extended to other Singapore issues), reflecting continued differences on the merits of introducing binding competition law disciplines into the WTO. This occurred despite seven years of discussion and exchange of views in the Working

Group, deliberations that greatly changed the substance of what was being proposed.¹³

Initially, four types of arguments were made for introducing antitrust in the WTO (European Commission 1995, 1996; Scherer 1994; U.S. 1998). First, the European Union, the United States, and other OECD members emphasized market access arguments. The claim was that national enforcement (or nonenforcement) of antitrust laws could and did give rise to pecuniary externalities by impeding effective market entry (contestability of the market) by foreign suppliers. Private business practices (foreclosure, abuse of dominance, and so forth) might nullify the expected benefits of negotiated trade liberalization commitments.

Second, proponents argued that differences in merger standards and multiple notification requirements across jurisdictions raised the costs of doing business and could give rise to regulatory (and trade) conflicts. The proposed solution generally involved harmonization.

Third, smaller countries, especially developing ones, raised concerns about possible anticompetitive behavior by multinationals (“abuse of dominance”) and their limited capacity to discipline possible anticompetitive abuses by such firms in their markets. Developing countries therefore could have an interest in an international agreement that outlawed export and international cartels that raise prices in their markets. They could also have an interest in an agreement that provides for their interests to be taken into account when large mergers are considered.

Fourth, several countries argued that a competition law and policy agreement might be used as a mechanism to discipline the use of antidumping and other competition-reducing trade and investment policies. In the case of antidumping, the idea was to take the predation rationale seriously and to apply competition law criteria to investigate whether exporters engaged in predation in antidumping cases. East Asian WTO members were leaders of this camp.¹⁴

Roads not taken. As discussions progressed over the 1996–2003 period, the emphasis on spillover rationales for cooperation gradually declined. Instead, stress was put on “systemic” or self-interest-type arguments for antitrust disciplines—the notion that legislation in this area was beneficial from a national perspective and would strengthen the global trading system (by complementing trade policy disciplines).

On the market access front—among the most prominent of the initial rationales—efforts to put competition-related issues on the WTO agenda were driven primarily by producer interests. In effect, the governments concerned were pursuing a traditional export promotion objective, not welfare or efficiency, the major focus of many national antitrust regimes. Hence a basic tension existed

regarding the consistency of an international agreement on competition policy geared toward dealing with market access pressures (specific producer interests) and the focus of antitrust on national welfare (dynamic efficiency). In the case of trade policy, the pursuit of mercantilist objectives by trade negotiators leads to an outcome that is welfare improving (unambiguously for small economies that are price takers on world markets).¹⁵ This cannot be said about competition policy; trading commitments on competition policy motivated by market access objectives could have negative implications for the enforcement of competition law more generally. Not surprisingly, a number of competition authorities resisted inclusion of competition policy disciplines in the WTO for this reason (see Klein 1996), and this part of the agenda was largely taken off the table in the course of Working Group deliberations.¹⁶ The focus shifted to support for a more general approach involving strengthening of national competition authorities in developing countries.¹⁷

In the mid-1990s, a number of scholars and policy makers called for the establishment of international competition disciplines enforced by a supranational body—analogue to (and inspired by) the EU model of integration—to deal with differences in merger standards and regulatory uncertainty created by simultaneous enforcement by differing jurisdictions. As was the case for market access concerns, this led to a vigorous response by antitrust authorities as well as analysts who feared that an inappropriate “one size fits all” approach could emerge (ICPAC 2000). Differences in law and practice, as well as reasonable differences between enforcers in terms of interpretation of identical provisions, made it clear that international convergence of substantive rules would be impossible to negotiate.¹⁸ The same is true of merger review standards. Only a supranational decision maker that looks at the *global* effects of a merger, effectively internalizing the welfare gains and losses across different national markets, can avoid the resource misallocation created by national merger review (Scherer 1994). Governments were far from ready to contemplate moving down this path.¹⁹ Thus both market access concerns and efforts to explore the scope for substantive harmonization of competition law were largely abandoned in the course of Working Group discussions.

What about negative spillovers associated with cartels? In the 1990s both the European Union and the United States investigated a number of cartels in such industries as vitamins, steel, and animal feed (Levenstein and Suslow 2001). The cartels that were identified often affected more than one national market. Levenstein, Oswald, and Suslow (2002) analyze the purchases by developing countries of 16 goods whose supply was found to be internationally cartelized by European or U.S. enterprises at some point during the 1990s. They find that in 1997 developing countries imported \$36.4 billion of goods from 10 industries that had seen a price-fixing conspiracy during the 1990s. These purchases represented 2.9 percent of developing country imports and 0.7 percent of their gross domestic product.

Such cartels are generally illegal under domestic antitrust laws. But similar effects may result from export cartels—agreements between domestic competitors designed to exploit market power on foreign markets or to allow firms to benefit from economies of scale or scope through cooperation. Export cartels may be legal—that is, firms engaging in such practices may be exempt from national antitrust in their home market—if they have no detrimental effect on home consumers. How damaging export cartels are is not known, as little research has been done in this area. But other cartel-type arrangements have been shown to have serious detrimental effects on developing countries (examples include international air and maritime transport cartels, which affect enterprise-level competitiveness). These arrangements are legal in that they are (inter-) governmental, but they can raise prices significantly for developing country shippers and consumers. Fink, Mattoo, and Neagu (2002) estimate that restrictive trade and anticompetitive practices raise maritime liner transport costs by up to \$3 billion a year on goods carried to the United States alone.

In principle, national competition authorities can use domestic antitrust law against domestic or international cartels that have effects in their territory. In practice, however, many developing countries have limited ability to do so. Recognition of capacity constraints in developing countries therefore provides another potential rationale for international cooperation in this area. The obvious solution to a poor country's inability to combat anticompetitive behavior of foreign firms on its markets is technical assistance and capacity building, which became a major focus of the deliberations of the Working Group. Note, however, that the implication is that the burden of enforcement is put on developing countries. An alternative approach would be for developed WTO members to discipline the ability of their own firms to collude to raise prices in developing countries (Hoekman and Mavroidis 2003). This would avoid implementation costs for developing country governments while addressing the negative spillover.

The WTO is a natural forum for such a deal, as developing countries would have to “pay” for such a commitment. In principle, the *quid pro quo* could take the form of market access concessions. Indeed, given that trade policy may be the only effective instrument developing country governments have to respond to foreign cartelization, developing country governments may have less incentive to undertake market access liberalization commitments if they recognize the possibility that they may be confronted with foreign anticompetitive behavior.

Hoekman and Saggi (2003) develop a simple model to investigate the feasibility of a deal involving linkage between specific antitrust disciplines of interest to poor countries—a ban on export cartels enforced by high-income countries—and market access commitments. They analyze the incentives a country that lacks the capacity to enforce national antitrust law has to trade market access

(controlled by a tariff) for foreign competition policy enforcement, that is, whether such type of cooperation can be sustained as the equilibrium outcome of a repeated game.²⁰ They compare this situation with one in which the developing country can “buy” competition enforcement from the trading partner through a transfer of some kind, as well as a situation in which the country can use both a carrot (transfer) and a stick (tariff). This option is shown to maximize the scope for cooperation. Moreover, the required transfers are smaller if developing countries have access to trade policy instruments. This suggests a rationale for countries to link binding of tariffs to an agreement to ban export cartels and “outsourcing” enforcement.

No move in this direction proved possible in the WTO, although a number of developing countries, including India and Thailand, did propose that export cartels be banned.²¹ No such linkage appears to have been proposed by any WTO member in the Working Group discussions. Indeed, the closest a proposal came to the outsourcing idea was a suggestion by Thailand that the WTO require that governments investigating a cartel engage in discussions with countries that may be affected (in order to allow them to take appropriate action) and that developing countries be financially compensated for delivering any “requested services.”

No progress was made on suggestions to explore whether competition policy could be used to discipline the explosion in the use of antidumping. This idea has been proposed for many years (see, for example, Hoekman and Mavroidis 1996; Wood 1989). Although the logic of the proposal is compelling (at least to economists), as it would imply a focus on injury to competition as opposed to injury only to certain competitors (petitioners), the lobbies supporting the antidumping status quo were successful in preventing this option from gaining traction in the Working Group. In practice, although the rhetoric of antidumping is couched in terms of “fair competition” (trade), the primary aim of antidumping policies is to protect domestic firms, not the competitive process (Finger 1993).²² More generally, the discussions in the Working Group focused almost exclusively on private practices and their regulation, not on government policies that may restrict competition and impose negative spillovers on trading partners.

The situation pre-Cancun. As of mid-2003 the most far-reaching proposals on the table were limited to WTO members adopting anticartel laws, calls for voluntary cooperation in national enforcement activities, and, insofar as members had broader competition laws, the need for these laws to abide by certain principles (transparency, due process, and nondiscrimination). The only substantive requirement suggested in many submissions was to ban “hard-core” cartels. Whether this included export cartels remained unclear, as the definition of hard-core cartels was left to negotiation. However, experience suggests that many OECD countries

would not be keen to include export cartels under any definition (indeed, many jurisdictions explicitly make allowance for such cartels) (OECD 1998).

In parallel to an agreement along the foregoing lines, several WTO members stressed the importance of voluntary cooperation. Canada (supported by other OECD countries and Thailand), suggested that a competition policy committee be created that would act as the focal point and clearing mechanism for notifications and exchanges of information, coordination and monitoring of technical assistance, and a forum for nonbinding peer reviews of national implementation of competition laws.

Thus the focus of proposals revolved primarily around national enforcement of competition law, with an emphasis on the need for technical and financial assistance to strengthen national competition authorities. Proposals for a compulsory positive comity requirement (a binding commitment to respond to requests to investigate activities claimed to negatively affect another country's interests), let alone the "outsourcing" of enforcement analyzed by Hoekman and Saggi (2003), were not supported in most submissions. While there can be no objection to improving competition law and enforcement offices, an almost exclusively domestic policy focus begs the question of the rationale for using the WTO for such cooperation. As discussed above, in the absence of externality motivations, cooperation in the WTO must rest on domestic political economy considerations. The suggestions that were made were quite limited, essentially requiring that WTO members adopt anticartel laws, abide by transparency and nondiscrimination rules, and ban "hard-core" cartels. As some 100 countries already have such laws or are in the process of adopting them, it is not clear that this proposal would have done much to address political constraints. The incentives to invoke WTO dispute settlement procedures would be weak under an agreement that is limited to basic principles for national antitrust, especially insofar as there is no scope to contest decisions in specific cases.²³ Given that foreign governments would not have much scope or incentive to bring cases, a major focus of the proposals for WTO rules in this area was on national enforcement and provision of technical assistance and capacity building (Clarke and Evenett 2003).²⁴

What next? A basic question confronting WTO members was whether a model of binding disciplines enforced through the threat of trade sanctions was appropriate. Answering this question requires a good understanding of the costs and benefits associated with the disciplines concerned. The discussions in the Working Group suggest that as of 2003 there was still substantial uncertainty on the part of many countries regarding the cost-benefit ratio of the proposals on the table. An alternative model to a binding agreement—various dimensions of which were included in many proposals—is a voluntary "learning to learn" framework

(Sabel and Reddy 2002). An advantage of a voluntary approach to cooperation is that peer review and information sharing, applied to specific policy areas (and ideally complemented with the provision of technical assistance) are less threatening in terms of potential downside.²⁵ It can also lead to the development of consensus standards on technical issues that members agree constitute good practice, even if participation and implementation are left to individual decisions by countries. The “learning” or “focal point” models that underlie voluntary cooperation help ensure that when implemented, policy changes have national ownership—that is, there are constituencies that support adoption of or changes in existing practices.

One option therefore was to limit cooperation to such voluntary interaction. This could have been pursued under the auspices of the WTO Working Group. Again, however, the question to be answered is, why do this in the WTO? Many forums already provide venues in which to discuss international competition issues. Indeed, a result of the WTO discussions, and of parallel interactions at the bilateral and plurilateral level (OECD, APEC, the Free Trade Area of the Americas), was the establishment of the International Competition Network (ICN).²⁶ The ICN brings together competition law enforcement officials from OECD and non-OECD countries to share information and develop “good practice” guidelines for enforcement. The ICN is an interagency entity, not an intergovernmental body, reflecting a desire on the part of the “competition community” not to have to engage with trade and other officials on modalities of international cooperation (disciplines) in “their” area. Practitioners engage in a cooperative effort to improve national policies and converge, where appropriate, on common standards, which are applied on a voluntary basis. Some intergovernmental bodies (such as the OECD and APEC) are also focal points for technical assistance in this area.

Such voluntary international cooperation may help improve domestic policies and performance. Even if this is not the case, as long as such forums generate more analysis and objective assessments of policies, they can help produce information on the size and distribution of the costs and benefits of the status quo, as well as the likely net payoffs of reform. This in itself may help change a given political economy equilibrium. It can also reduce the uncertainty regarding the possible repercussions of a subsequent engagement to negotiate binding commitments on competition policy. Information and analysis are important inputs into a well-functioning trading order. Greater monitoring and assessment of the impacts of policies would allow more informed and proactive engagement by civil society (think tanks, nongovernmental organizations, consumers, and taxpayers) in the policy formation and negotiation process. Progress has been made in the WTO in terms of surveillance and collection of basic data on trade policy, but much more can be done to estimate the magnitude and incidence of the costs of protection.

The lacunae are an order of magnitude greater in the case for competition policy. To what extent are the preconditions for cartelization in place? Are markets contestable? How large are barriers to entry and sunk costs? The more that is done to objectively determine the effects of prevailing policies in achieving stated national objectives, the more scope there will be for countries (stakeholders) to assess their efficacy and efficiency and, if needed, adjust them. Such analysis could be taken up in the WTO Working Group, as well as in research organizations and networks of think tanks and researchers (for example, the Global Development Network) and bodies such as the ICN, the OECD, and APEC. Indeed, “competition” in the provision of such information is important, as not all forums will have incentives to deal with the issues that are most important to developing countries. Thus the ICN has focused more on merger-related issues and enforcement techniques than on cartels, vertical restraints, or abuse of dominance. It is also very unlikely to ever become a mechanism through which agencies would agree to engage in enforcement of legislation in favor of nonnationals.

The acid test for the inclusion of binding disciplines on regulatory issues in trade agreements is whether benefits outweigh costs. International mechanisms to exchange information on good practices and develop rules of thumb for behind-the-border trade-related policies can be very beneficial for developing countries. If the end point for the foreseeable future of efforts to negotiate binding rules in the WTO on competition law is greater cooperation in sharing experiences and information on policies and outcomes, efforts have by no means been a failure. As noted, a “soft law” approach that relies on transparency and increases accountability through regular (multilateral) monitoring of performance may be more effective in increasing cooperation by enhancing the feeling of ownership of specific norms. While detailed international harmonization through trade agreements is likely to be inappropriate in many instances, multilateral norms and disciplines, especially monitoring and information exchange, can help prevent capture and provide information on the effectiveness and impacts of policies. Moreover, it may well be that international treaty instruments, if deemed beneficial, will be multidimensional and rely primarily on noncoercive forms of enforcement, as argued in ICPAC (2000) for the specific case of international competition policy issues and more generally in the international relations literature (see, for example, Chayes and Chayes 1995).

15.3 Concluding Remarks

A vigorous competition policy is beneficial for developing countries. It can and should be implemented unilaterally. Indeed, many countries have implemented antitrust laws, although the extent to which such laws are vigorously enforced

varies enormously. Whether it makes sense to have competition legislation—something that was belabored *ad infinitum* by proponents of WTO competition policy disciplines—is not the point. The question is, what are the payoffs to international cooperation and what type of cooperation makes sense?

Countries can and do cooperate on a bilateral, plurilateral, and multilateral basis in this area, mostly on a voluntary, nonbinding basis. For an international agreement that relies on binding enforcement to be beneficial, it must either offset a negative spillover imposed by other countries or help governments overcome domestic political economy constraints that impede the adoption of welfare-enhancing policy changes. In principle, both conditions are satisfied in the competition policy context for developing countries. Although market access impediments resulting from anticompetitive behavior by firms can and should be dealt with by domestic competition authorities, in many countries institutional weaknesses may impede the authorities from doing so. One solution is to assist such countries through “education” (learning through information exchange, for example) and technical and financial assistance. At the end of the day, this became a major element of the proposals on the table in the run-up to the Cancun Ministerial Meeting. The main focus had shifted from market access and other potential sources of negative spillovers to improving domestic capacity to enforce national antitrust-type legislation (with the emphasis on anticartel laws). In itself this would be beneficial; the question is whether the WTO is the most effective and efficient venue for such activity. Given the existence of complementary forums for such cooperation, the revealed preferred answer of many countries was that it is not.

Very little was proposed in terms of proactive measures by industrial countries to discipline anticompetitive practices that have effects on developing country markets. It is ironic that in areas in which there are clearly spillovers and potential gains from more binding forms of cooperation—requiring competition authorities in developed countries to take the interests of affected developing countries into account in merger decisions, imposing disciplines on export cartels and enforcement action against international cartels, replacing antidumping law with competition law—the few proposals put forth were weak. While the outcome of an eventual negotiation cannot be predicted, experience suggests that significant progress along these lines would have been unlikely. It proved impossible to agree to ban export cartels even among OECD members (OECD 1998). For large OECD countries, any agreement to make binding commitments to follow a compulsory positive comity rule in mergers and anticartel enforcement or a prohibition on export cartels that have a detrimental effect on developing countries will imply costs. These costs are both direct (the need to spend enforcement-related resources) and indirect (potential reductions in home country welfare insofar as

the agreement worsens the terms of trade). The implication is that any move in this direction would require a significant quid pro quo on the part of developing countries, one that goes beyond a general willingness to adopt and enforce competition legislation.

By 2005 competition policy was no longer on the Doha table, although it is likely that the Working Group will continue its deliberations. If and when this topic is brought back to the negotiating table, the case will be much stronger if the focus is more explicitly on spillovers created by national enforcement of competition law (or the lack thereof), along the lines discussed in this chapter. Arguments to the effect that involving the WTO can help overcome domestic political economy constraints in developing countries by imposing external discipline are not very compelling—the same effect can be obtained through voluntary cooperation that generates information on the existence and effect of anticompetitive market structures and practices. Indeed, voluntary cooperation may well be more effective in mobilizing support for competition law enforcement. A major problem with using the WTO to address such domestic political economy constraints is that the existing enforcement mechanism (threat of trade sanctions by governments) is unlikely to be very effective. The WTO is driven by export interests (market access), not national welfare considerations. Given the lack of a one-to-one relationship between competition law enforcement (or the lack thereof) and market access, the ability of a WTO-based process to play a constructive role is inherently limited (albeit not zero). What matters is the existence of negative spillovers, which are not necessarily limited to market access effects.

Over time, the voluntary mechanisms that have emerged could help identify where progress may be possible and binding cooperation beneficial. Indeed, the main outcome of efforts to launch WTO negotiations was to strengthen international voluntary cooperation in this area. “Transparency institutions” have long been promoted by trade and competition policy analysts who argue that public information on the costs and benefits of government policies is required in order to countervail rent-seeking activities (see, for example, Finger 1982). The ICN is a useful vehicle to improve the transparency of competition policy, as are the activities of APEC, the OECD, and UNCTAD. A “soft law,” voluntary approach is premised to a large extent on the generation and exchange of information, which is in turn a precondition for building a common understanding of what types of practices and cooperation are beneficial.²⁷

Competition enforcement is an *ex post* endeavor, and the state of competition is inherently difficult if not impossible to quantify—no tariff equivalents can be calculated. Nonetheless, a concerted effort to collect cross-country data on entry and exit (turnover), the number of firms in a market and their size distribution, import penetration, the share of foreign direct investment by industry, and other

measures could provide useful indicators of the state of competition and trends over time, if complemented by systematic information on the policies that affect these outcomes.²⁸ Such analysis could complement assessments of the impact of government measures that restrict competition and distort international trade and investment flows. These measures are, of course, the primary focus of existing WTO rules. Much more can and should be done to strengthen multilateral disciplines on government policies in order to enhance the contestability of markets. As many observers have argued, this is an area in which the WTO has both the mandate and the capacity to move forward. Many of the policy areas are on the Doha Agenda—services (transport, distribution, telecommunications); agricultural subsidies; and antidumping and regional integration (discrimination) are all examples of policy domains where much remains to be done to enhance international competition (Hoekman and Mavroidis 1994; Wood 2004). These areas should be seen as an important international dimension of the “antitrust” agenda and a priority for action through the WTO.

An immediate question confronting WTO members is what role, if any, the Working Group should play in the future. One constructive role for such a body would be to become much more of a transparency body rather than engage in a prenegotiation process of the type it has pursued to date. The focus, in our view, should be on the interface between trade and competition broadly defined, with the WTO acting as a vehicle to identify the existence and magnitude of negative spillovers, whether due to private behavior or to government policies such as those just mentioned. In the deliberations of the Working Group, advocates of competition law disciplines frequently pointed to the need and value of so-called competition advocacy by national enforcement authorities. Looking ahead, this principle could very usefully be used as the central element of the terms of reference for the Working Group. Any government policies that are identified as having competition-reducing or distorting effects could be put forward as issues to be addressed in the relevant existing WTO agreements. This could provide a basis for moving the competition agenda forward. A multilateral body such as the Working Group could also usefully monitor and complement the voluntary types of cooperation that have now emerged. Such forums for voluntary cooperation may not deal with dimensions of the competition agenda, broadly defined, that are important for developing countries.

Finally, from a development perspective—for example, achievement of the Millennium Development Goals—developed countries could do much unilaterally to assist developing countries. Nothing prevents rich countries from unilaterally deciding to make export cartels illegal, from shifting to decoupled support of farmers, from liberalizing access to their markets, from making it much more difficult to impose antidumping duties on developing country exports, and so forth.

These types of actions would constitute important nonfiscal (financial) forms of development assistance and do much to leverage the growth-enhancing impact of official development transfers by promoting competition.

Notes

1. See Bagwell and Staiger (2004) for a recent formal analysis that supports this conclusion.
2. This is not to deny that competition law and policy are important from a development perspective. They are (see, for example, Khemani and Dutz 1995). In one of the few cross-country statistical analyses of the impact of competition laws, Kee and Hoekman (2003) find a statistically significant impact of such laws on price-cost markups. The point here is not to argue against the benefits of national competition enforcement; the question is what the WTO can and should do in this domain.
3. As discussed below, the proposals by Thailand constitute an exception.
4. Unlike the OECD, APEC, and UNCTAD, the International Competition Network is a non-governmental forum for cooperation.
5. Bolaky and Freund (2004) focus on regulation of new entry (number of procedures, time and cost involved) and labor market restrictions on new hiring and layoffs.
6. In a coordination game, agents (firms, countries) have an incentive to adopt a common standard (technology, behavioral norms, and so forth), as doing so leads to higher sales, profits, and welfare. The classic example is a decision on which side of the road to drive on. In game theory, coordination games involve situations of interdependent decision making.
7. The principle of positive comity requires that a government body take into account the interests of other countries in applying national law.
8. As Evenett (2002) notes, differences in merger notification requirements, the timeliness of merger review decisions, and the scope and requirements for appeal add to the cost of undertaking international mergers. In addition, there are costs and uncertainty associated with the probability that different and inconsistent decisions are made by national antitrust authorities. These transactions costs have been a source of concern for firms and the international bar (see ICPAC 2000).
9. Cooperation may also be motivated by capacity constraints. These constraints may create incentives for a government to seek to "outsource" enforcement, either through informal free riding (letting others develop norms) or by explicitly delegating implementation to outside agencies, which may include other governments.
10. In the international relations literature, this approach is espoused by the neorealist school. It assumes that states are rational, unitary actors that must rely on self-help (for example, a tit-for-tat-based threat of retaliation against defections from negotiated agreements to enforce international cooperation). The economists' "enforcement model" of international cooperation is by no means uncontested and certainly not universal. In practice, a "managerial model" that relies on a cooperative, problem-solving approach as opposed to a coercive one is much more prevalent (see Chayes and Chayes 1995).
11. Saggi and Yildiz (2005) argue that mergers can create international externalities, not all of which are negative. A merger in one country, for example, can benefit its rivals in another country, who also benefit from the price increase that follows the merger. In fact, such free-riding effects can make it rational for a country to pursue a tight merger policy itself (to avoid inflicting costs on its consumers) given that a competing foreign country pursues a lax merger policy. See Horn and Levinsohn (2001) for a formal analysis of some of the general issues involved with respect to the interaction of trade and competition policy.
12. See the September 1994 issue of *Aussenwirtschaft* (*Swiss Review of International Economic Relations*) for several contributions that describe the history of international discussions on this subject. Scherer (1994) discusses the international dimensions of mergers and the case for international cooperation.
13. Annual reports by the WTO Secretariat on the deliberations of the WTO Working Group on the Interaction between Trade and Competition Policy between 1998 and 2003 provide a good

synthesis of the issues discussed (see WTO various years). Clarke and Evenett (2003) provide a detailed discussion of the proposals made. What follows draws in part on their summary of the various proposals, all of which can be found on the WTO Web site and in Hoekman (1997).

14. Observers in the early 1990s noted that many types of government policies or measures may have the effect of restricting international competition and that private anticompetitive practices often need to be supported by government policies (or at a minimum, benefit from government tolerance). An implication was that these types of policies could well be more distorting or detrimental to world welfare. Of course, many of these types of policies can be negotiated through the WTO; examples include state trading, access to distribution services (covered by the General Agreement on Trade in Services), agricultural subsidies, international shipping cartels, and restrictive air transport agreements between governments (see Hoekman and Mavroidis 1994).

15. This assumes that a developing country is participating in reciprocal tariff negotiations. Net gains may not arise from other countries' liberalization if barriers to the country's exports remain high because developing countries are not offering concessions, while tariffs in the rest of the world fall for the goods the developing country imports. The resulting increase in world prices could make the country worse off.

16. Insofar as private practices are alleged to restrict access, a first step should be to investigate whether there are policies that support such behavior, such as barriers to entry that impede access to distribution channels. In practice, the worst instances of entry/contestability restrictions are likely to be due to or supported by government policies (Hoekman 1997).

17. One could argue that this would indirectly promote the market access agenda. But, in contrast to trade liberalization, stronger antitrust disciplines generally will not have a one-for-one positive relationship with market access. Thus competition authorities may well have no problem from a welfare or efficiency perspective with exclusive relationships between firms along the production chain, which may be needed to ensure compliance with contracts or to guarantee a positive rate of return on relationship-specific assets that give rise to unrecoverable sunk costs. Moreover, given that the more prominent examples of access issues pertained to countries with long-standing competition legislation and enforcement authorities and that different countries apply even similar legal standards in different ways, a national approach implied that the market access agenda would not really be addressed.

18. For example, there are often differences in view and approach toward vertical restrictions. While vertical restraints can exacerbate other market imperfections, especially given asymmetric information, they may be beneficial. U.S. courts therefore use a rule of reason approach, assessing costs and benefits on a case-by-case basis. Even if identical language were adopted by different jurisdictions, interpretations and decisions could easily differ, depending on the weights put on various factors by national authorities (Fox 1998).

19. On the issue of transaction costs associated with merger notifications and provision of company information, many competition authorities were more comfortable with bilateral cooperation than with multilateral disciplines requiring sharing of information or harmonization of procedures and criteria.

20. Bhattachareja (2004) has argued that while importing countries ought to evaluate foreign cartels under a "role of reason" approach, they will frequently be constrained by their lack of knowledge and limited enforcement capacity. He suggests that an approach akin to that used in the antidumping process could help deal with export cartels—that is, importing countries could adopt an administrative procedure (instead of a judicial one) in which cartelization would deem to have been harmful if the price charged by a cartel exceeded a "normal/fair" value.

21. India proposed that any ban on export cartels apply only to high-income countries (Clarke and Evenett 2003).

22. This is quite clear from the injury standard in the antidumping agreement.

23. Many proposals suggest that the reach of the Dispute Settlement Understanding be limited to implementation of the "framework" rules (nondiscrimination, transparency, and so forth) and not extend to specific cases. Thus it would not be possible to argue against the substance of a decision or to argue that the authorities should have taken action against a purported cartel.

24. There would be some incentives, however, if an antitrust authority of a country concerned with the behavior of firms from another country on its market did not receive adequate cooperation following a request for information from the home country authorities of the firms.

25. Even nonbinding types of cooperation may not be completely toothless. Thus, for example, international peer review and assessments of national performance in a policy area may influence country credit risk perceptions.

26. See UNCTAD (2002) for a list of existing international cooperative instruments dealing with competition law and policy, including bilateral agreements on enforcement (for example, mutual legal assistance treaties) and multilateral and plurilateral instruments (OECD, UNCTAD, and so forth).

27. For a discussion focusing on antitrust, see Wood (2004). More generally, see Abbott (2001) and Abbott and Snidal (2000).

28. See Djankov and Hoekman (1998), Evenett and Suslow (2000), Fox (1998), and Graham and Richardson (1997) for discussions of criteria and options for procedural cooperation and enhanced transparency.

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How can international trade agreements promote development and how can rules be designed to benefit poor countries? Can multilateral trade cooperation in the World Trade Organization (WTO) help developing countries create and strengthen institutions and regulatory regimes that will enhance the gains from trade and integration into the global economy? And should this even be done? These are questions that confront policy makers and citizens in both rich and poor countries, and they are the subject of *Economic Development and Multilateral Trade Cooperation*. This book analyzes how the trading system could be made more supportive of economic development, without eroding the core WTO functions.

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